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* * * * * * * * * *   Welcome to STN International   * * * * * * * * * *

 NEWS  1           Web Page URLs for STN Seminar Schedule - N. America
 NEWS  2           "Ask CAS" for self-help around the clock
 NEWS  3  DEC 18   CA/CAplus pre-1967 chemical substance index entries enhanced
                   with preparation role
 NEWS  4  DEC 18   CA/CAplus patent kind codes updated
 NEWS  5  DEC 18   MARPAT to CA/CAplus accession number crossover limit increased
                   to 50,000
 NEWS  6  DEC 18   MEDLINE updated in preparation for 2007 reload
 NEWS  7  DEC 27   CA/CAplus enhanced with more pre-1907 records
 NEWS  8  JAN 08   CHEMLIST enhanced with New Zealand Inventory of Chemicals
 NEWS  9  JAN 16   CA/CAplus Company Name Thesaurus enhanced and reloaded
 NEWS 10  JAN 16   IPC version 2007.01 thesaurus available on STN
 NEWS 11  JAN 16   WPIDS/WPINDEX/WPIX enhanced with IPC 8 reclassification data
 NEWS 12  JAN 22   CA/CAplus updated with revised CAS roles
 NEWS 13  JAN 22   CA/CAplus enhanced with patent applications from India
 NEWS 14  JAN 29   PHAR reloaded with new search and display fields
 NEWS 15  JAN 29   CAS Registry Number crossover limit increased to 300,000 in
                   multiple databases
 NEWS 16  FEB 15   PATDPASPC enhanced with Drug Approval numbers
 NEWS 17  FEB 15   RUSSIAPAT enhanced with pre-1994 records
 NEWS 18  FEB 23   KOREAPAT enhanced with IPC 8 features and functionality
 NEWS 19  FEB 26   MEDLINE reloaded with enhancements
 NEWS 20  FEB 26   EMBASE enhanced with Clinical Trial Number field
 NEWS 21  FEB 26   TOXCENTER enhanced with reloaded MEDLINE
 NEWS 22  FEB 26   IFICDB/IFIPAT/IFIUDB reloaded with enhancements
 NEWS 23  FEB 26   CAS Registry Number crossover limit increased from 10,000
                   to 300,000 in multiple databases
 NEWS 24  MAR 15   WPIDS/WPIX enhanced with new FRAGHITSTR display format
 NEWS 25  MAR 16   CASREACT coverage extended
 NEWS 26  MAR 20   MARPAT now updated daily
 NEWS 27  MAR 22   LWPI reloaded
 NEWS 28  MAR 30   RDISCLOSURE reloaded with enhancements
 NEWS 29  MAR 30   INPADOCDB will replace INPADOC on STN
 NEWS 30  APR 02   JICST-EPLUS removed from database clusters and STN

 NEWS EXPRESS  NOVEMBER 10 CURRENT WINDOWS VERSION IS V8.01c, CURRENT
               MACINTOSH VERSION IS V6.0c(ENG) AND V6.0Jc(JP),
               AND CURRENT DISCOVER FILE IS DATED 25 SEPTEMBER 2006.

 NEWS HOURS    STN Operating Hours Plus Help Desk Availability
 NEWS LOGIN    Welcome Banner and News Items
 NEWS IPC8     For general information regarding STN implementation of IPC 8
 NEWS X25      X.25 communication option no longer available

Enter NEWS followed by the item number or name to see news on that
specific topic.

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FILE 'HOME' ENTERED AT 00:28:45 ON 14 APR 2007

=> file ca
COST IN U.S. DOLLARS                                SINCE FILE      TOTAL
                                                       ENTRY    SESSION
FULL ESTIMATED COST                                     0.21       0.21

FILE 'CA' ENTERED AT 00:28:55 ON 14 APR 2007
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PLEASE SEE "HELP USAGETERMS" FOR DETAILS.

FILE COVERS 1907 - 12 Apr 2007 VOL 146 ISS 17
FILE LAST UPDATED: 12 Apr 2007 (20070412/ED)

New CAS Information Use Policies, enter HELP USAGETERMS for details.

This file contains CAS Registry Numbers for easy and accurate
substance identification.

```
=> s (bioactive glass or bioinert glass)/ab,bi
         18871 BIOACTIVE/AB
        567261 GLASS/AB
           866 BIOACTIVE GLASS/AB
                 ((BIOACTIVE(W)GLASS)/AB)
         24167 BIOACTIVE/BI
        709327 GLASS/BI
          1893 BIOACTIVE GLASS/BI
                 ((BIOACTIVE(W)GLASS)/BI)
           281 BIOINERT/AB
        567261 GLASS/AB
             5 BIOINERT GLASS/AB
                 ((BIOINERT(W)GLASS)/AB)
           303 BIOINERT/BI
        709327 GLASS/BI
             6 BIOINERT GLASS/BI
                 ((BIOINERT(W)GLASS)/BI)
L1       1895 (BIOACTIVE GLASS OR BIOINERT GLASS)/AB,BI

=> s (tissue)/ab,bi
        506814 (TISSUE)/AB
        694908 (TISSUE)/BI
L2      694908 (TISSUE)/AB,BI

=> s l1 and l2
L3         524 L1 AND L2

=> s (silicon dioxide or boron oxide or aluminum oxide or potassium oxide or sodium oxide)/ab
        133409 SILICON/AB
         72552 DIOXIDE/AB
          5380 SILICON DIOXIDE/AB
                 ((SILICON(W)DIOXIDE)/AB)
        803630 SILICON/BI
        480604 DIOXIDE/BI
         35468 SILICON DIOXIDE/BI
                 ((SILICON(W)DIOXIDE)/BI)
         35110 BORON/AB
        669160 OXIDE/AB
           912 BORON OXIDE/AB
                 ((BORON(W)OXIDE)/AB)
        232057 BORON/BI
       1722210 OXIDE/BI
         22357 BORON OXIDE/BI
                 ((BORON(W)OXIDE)/BI)
        113961 ALUMINUM/AB
        669160 OXIDE/AB
          6873 ALUMINUM OXIDE/AB
                 ((ALUMINUM(W)OXIDE)/AB)
        960380 ALUMINUM/BI
```

```
       1722210 OXIDE/BI
         95992 ALUMINUM OXIDE/BI
                 ((ALUMINUM(W)OXIDE)/BI)
         96044 POTASSIUM/AB
        669160 OXIDE/AB
           312 POTASSIUM OXIDE/AB
                 ((POTASSIUM(W)OXIDE)/AB)
        623841 POTASSIUM/BI
       1722210 OXIDE/BI
         19530 POTASSIUM OXIDE/BI
                 ((POTASSIUM(W)OXIDE)/BI)
        242667 SODIUM/AB
        669160 OXIDE/AB
           541 SODIUM OXIDE/AB
                 ((SODIUM(W)OXIDE)/AB)
       1094530 SODIUM/BI
       1722210 OXIDE/BI
         27183 SODIUM OXIDE/BI
                 ((SODIUM(W)OXIDE)/BI)
L4      174432 (SILICON DIOXIDE OR BORON OXIDE OR ALUMINUM OXIDE OR POTASSIUM
               OXIDE OR SODIUM OXIDE)/AB,BI

=> s l3 and l4
L5         108 L3 AND L4

=> s (Ag or Au or V or Cr or Co or Cu)/ab,bi
        303866 AG/AB
        314651 AG/BI
        173765 AU/AB
        179179 AU/BI
        976227 V/AB
       1076455 V/BI
        386843 CR/AB
        400886 CR/BI
        792219 CO/AB
        843874 CO/BI
        789373 CU/AB
        811795 CU/BI
L6     2988087 (AG OR AU OR V OR CR OR CO OR CU)/AB,BI

=> s l5 and l6
L7           6 L5 AND L6

=> d 1-6

L7   ANSWER 1 OF 6  CA  COPYRIGHT 2007 ACS on STN
Full Text
AN   145:425576  CA
TI   Effect of polymer processing on the degradation of 45S5
     bioglass/poly(lactic acid-co-glycolic acid) composite scaffolds for
     tissue engineering
AU   Notingher, Ioan; Blaker, Jonny J.; Maquet, Veronique; Hench, Larry L.;
     Boccaccini, Aldo R.
CS   Department of Materials and Center for Tissue Engineering and Regenerative
     Medicine, Imperial College London, London, SW7 2BP, UK
SO   Asian Journal of Physics (2006), 15(2), 221-230
     CODEN: AJPHFU; ISSN: 0971-3093
PB   Anita Publications
DT   Journal
LA   English
RE.CNT  28    THERE ARE 28 CITED REFERENCES AVAILABLE FOR THIS RECORD
              ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7   ANSWER 2 OF 6  CA  COPYRIGHT 2007 ACS on STN
Full Text
AN   145:383290  CA
TI   Composites of amorphous calcium phosphate and poly(hydroxybutyrate) and
     poly(hydroxybutyrate-co-hydroxyvalerate) for bone substitution:
     assessment of the biocompatibility
AU   Linhart, Wolfgang; Lehmann, Wolfgang; Siedler, Michael; Peters, Fabian;
     Schilling, Arndt F.; Schwarz, Karsten; Amling, Michael; Rueger, Johannes
     Maria; Epple, Matthias
```

CS Department of Trauma, Hand and Reconstructive Surgery, Hamburg University, School of Medicine, Hamburg, D-20246, Germany
SO Journal of Materials Science (2006), 41(15), 4806-4813
CODEN: JMTSAS; ISSN: 0022-2461
PB Springer
DT Journal
LA English
RE.CNT 43 THERE ARE 43 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 3 OF 6 CA COPYRIGHT 2007 ACS on STN
Full Text
AN 141:248621 CA
TI Bioactivity of SiO2-CaO-Na2O glasses modified by silver-surface enrichment
AU Di Nunzio, S.; Verne, E.
CS Department of Material Science and Chemical Engineering, Politecnico di Torino, Turin, Italy
SO Journal of Applied Biomaterials & Biomechanics (2003), 1(3), 218
CODEN: JABBA7; ISSN: 1722-6899
PB Wichtig Editore
DT Journal
LA English
RE.CNT 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 4 OF 6 CA COPYRIGHT 2007 ACS on STN
Full Text
AN 140:395434 CA
TI Influence of physicochemical reactions of **bioactive glass** on the behavior and activity of human osteoblasts in vitro
AU Josset, Y.; Nasrallah, F.; Jallot, E.; Lorenzato, M.; Dufour-mallet, O.; Balossier, G.; Laurent-maquin, D.
CS INSERM E.R.M. 0203, IFR 53, UFR Odontologie, Reims, 51095, Fr.
SO Journal of Biomedical Materials Research, Part A (2003), 67A(4), 1205-1218
CODEN: JBMRCH
PB John Wiley & Sons, Inc.
DT Journal
LA English
RE.CNT 43 THERE ARE 43 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 5 OF 6 CA COPYRIGHT 2007 ACS on STN
Full Text
AN 139:354388 CA
TI Thermodynamics of non-bridging oxygen in silica bio-compatible glass-ceramics. Mimetic material for the bone **tissue** substitution
AU Koga, N.; Strnad, Z.; Sestak, J.; Strnad, J.
CS Chemistry Laboratory, Department of Science Education, Graduate School of Education, Hiroshima University, Higashi-Hiroshima, 739-8524, Japan
SO Journal of Thermal Analysis and Calorimetry (2003), 71(3), 927-937
CODEN: JTACF7; ISSN: 1388-6150
PB Kluwer Academic Publishers
DT Journal
LA English
RE.CNT 55 THERE ARE 55 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

L7 ANSWER 6 OF 6 CA COPYRIGHT 2007 ACS on STN
Full Text
AN 137:68103 CA
TI Bioactivity of Na2O.CaO.SiO2.P2O5 modified glasses
AU Barrios de Arenas, Irene; Schattner, Carol; Vasquez, Maritza
CS Electron Microscopy Lab., Department of Materials Technology, I.U.T. - Region Capital, Caracas, 1040, Venez.
SO Key Engineering Materials (2002), 206-213(Pt. 3, Euro Ceramics VII), 1625-1628
CODEN: KEMAEY; ISSN: 1013-9826
PB Trans Tech Publications Ltd.
DT Journal
LA English
RE.CNT 12 THERE ARE 12 CITED REFERENCES AVAILABLE FOR THIS RECORD
ALL CITATIONS AVAILABLE IN THE RE FORMAT

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=> file uspatall
COST IN U.S. DOLLARS                                    SINCE FILE      TOTAL
                                                           ENTRY    SESSION
FULL ESTIMATED COST                                        89.67      89.88

FILE 'USPATFULL' ENTERED AT 00:31:54 ON 14 APR 2007
CA INDEXING COPYRIGHT (C) 2007 AMERICAN CHEMICAL SOCIETY (ACS)

FILE 'USPAT2' ENTERED AT 00:31:54 ON 14 APR 2007
CA INDEXING COPYRIGHT (C) 2007 AMERICAN CHEMICAL SOCIETY (ACS)

=> d his

     (FILE 'HOME' ENTERED AT 00:28:45 ON 14 APR 2007)

     FILE 'CA' ENTERED AT 00:28:55 ON 14 APR 2007
L1          1895 S (BIOACTIVE GLASS OR BIOINERT GLASS)/AB,BI
L2        694908 S (TISSUE)/AB,BI
L3           524 S L1 AND L2
L4        174432 S (SILICON DIOXIDE OR BORON OXIDE OR ALUMINUM OXIDE OR POTASSIU
L5           108 S L3 AND L4
L6       2988087 S (AG OR AU OR V OR CR OR CO OR CU)/AB,BI
L7             6 S L5 AND L6

     FILE 'USPATFULL, USPAT2' ENTERED AT 00:31:54 ON 14 APR 2007

=> s (bioactive glass or bioinert glass)
L8          612 (BIOACTIVE GLASS OR BIOINERT GLASS)

=> s (tissue)
L9       351006 (TISSUE)

=> s (silicon dioxide or boron oxide or aluminum oxide or potassium oxide or sodium oxide)
L10      194307 (SILICON DIOXIDE OR BORON OXIDE OR ALUMINUM OXIDE OR POTASSIUM
                OXIDE OR SODIUM OXIDE)

=> s (Ag or Au or V or Cr or Co or Cu)
L11     2084571 (AG OR AU OR V OR CR OR CO OR CU)

=> s (bioactive glass or bioinert glass)/clm
L12         187 (BIOACTIVE GLASS OR BIOINERT GLASS)/CLM

=> s (tissue)/clm
L13       75611 (TISSUE)/CLM

=> s (silicon dioxide or boron oxide or aluminum oxide or potassium oxide or sodium oxide)/cl
L14       39506 (SILICON DIOXIDE OR BORON OXIDE OR ALUMINUM OXIDE OR POTASSIUM
                OXIDE OR SODIUM OXIDE)/CLM

=> s (Ag or Au or V or Cr or Co or Cu)/clm
L15      382547 (AG OR AU OR V OR CR OR CO OR CU)/CLM

=> s l8 and l9 and l10 and l11
L16          77 L8 AND L9 AND L10 AND L11

=> s l12 and l13 and l14 and l15
L17           1 L12 AND L13 AND L14 AND L15

=> d

L17  ANSWER 1 OF 1  USPATFULL on STN
Full Text
AN      2004:196441  USPATFULL
TI      Tissue abrasives
IN      Zimmer, Jose, Ingelheim, GERMANY, FEDERAL REPUBLIC OF
        Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
        Rosati, Coni, Encinitas, CA, UNITED STATES
PI      US 2004151745        A1  20040805
AI      US 2003-696878       A1  20031030 (10)
RLI     Continuation-in-part of Ser. No. US 2003-673596, filed on 29 Sep 2003,
```

```
       PENDING Continuation-in-part of Ser. No. US 2001-818466, filed on 27 Mar
       2001, PENDING
DT     Utility
FS     APPLICATION
LN.CNT 816
INCL   INCLM: 424/401.000
NCL    NCLM:  424/401.000
IC     [7]
       ICM    A61K007-00
       IPCI   A61K0007-00 [ICM,7]
       IPCR   A61K0008-19 [I,C*]; A61K0008-22 [I,A]; A61Q0011-00 [I,C*];
              A61Q0011-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.


=> d l16 1-77

L16  ANSWER 1 OF 77  USPATFULL on STN
Full Text
AN     2007:29801  USPATFULL
TI     Biommetic hierarchies using functionalized nanoparticles as building
       blocks
IN     Shastri, Venkatram P, Nashville, TN, UNITED STATES
       Chen, I-Wei, Swarthmore, PA, UNITED STATES
       Zindarsic, William, Philadelphia, PA, UNITED STATES
PI     US 2007026069       A1  20070201
AI     US 2004-550923      A1  20040326 (10)
       WO 2004-US9192          20040326
                               20060922  PCT 371 date
PRAI   US 2003-458258P     20030328 (60)
DT     Utility
FS     APPLICATION
LN.CNT 1251
INCL   INCLM: 424/486.000
       INCLS: 424/489.000; 424/093.700; 977/906.000
NCL    NCLM:  424/486.000
       NCLS:  424/093.700; 424/489.000; 977/906.000
IC     IPCI   A61K0035-12 [I,A]; A61K0009-14 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 2 OF 77  USPATFULL on STN
Full Text
AN     2006:274093  USPATFULL
TI     Bioactive material for use in stimulating vascularization
IN     Day, Richard M., Harrow, UNITED KINGDOM
PA     The North West London Hospitals N H S Trust (non-U.S. corporation)
PI     US 2006233887       A1  20061019
AI     US 2004-545766      A1  20040213 (10)
       WO 2004-GB578           20040213
                               20060522  PCT 371 date
PRAI   GB 2003-3371        20030214
       GB 2003-23816       20031010
DT     Utility
FS     APPLICATION
LN.CNT 1444
INCL   INCLM: 424/602.000
       INCLS: 501/063.000
NCL    NCLM:  424/602.000
       NCLS:  501/063.000
IC     IPCI   A61K0033-42 [I,A]; C03C0003-097 [I,A]; C03C0003-076 [I,C*]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 3 OF 77  USPATFULL on STN
Full Text
AN     2006:250953  USPATFULL
TI     Hydraulic cement compositions and methods of making and using the same
IN     Lu, Donghui, Vancouver, CANADA
       Zhou, Shuxin, Vancouver, CANADA
PI     US 2006213395       A1  20060928
AI     US 2006-390702      A1  20060327 (11)
PRAI   US 2005-664977P     20050325 (60)
DT     Utility
```

FS APPLICATION
LN.CNT 1070
INCL INCLM: 106/035.000
INCLS: 106/691.000; 106/690.000; 106/640.000; 106/736.000; 106/717.000
NCL NCLM: 106/035.000
NCLS: 106/640.000; 106/690.000; 106/691.000; 106/717.000; 106/736.000
IC IPCI C04B0014-48 [I,A]; C04B0014-38 [I,C*]; C04B0028-34 [I,A];
C04B0028-00 [I,C*]; C04B0024-00 [I,A]; C04B0014-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 4 OF 77 USPATFULL on STN
Full Text
AN 2006:240293 USPATFULL
TI Medical device applications of nanostructured surfaces
IN Dubrow, Robert S., San Carlos, CA, UNITED STATES
Bock, Lawrence A., Encinitas, CA, UNITED STATES
Daniels, R. Hugh, Mountain View, CA, UNITED STATES
Hardev, Veeral D., Redwood City, CA, UNITED STATES
Niu, Chunming, Palo Alto, CA, UNITED STATES
Sahi, Vijendra, Menlo Park, CA, UNITED STATES
PA Nanosys, Inc., Palo Alto, CA, UNITED STATES (U.S. corporation)
PI US 2006204738 A1 20060914
AI US 2006-330722 A1 20060112 (11)
RLI Continuation-in-part of Ser. No. US 2005-90895, filed on 24 Mar 2005, PENDING Continuation-in-part of Ser. No. US 2004-902700, filed on 29 Jul 2004, PENDING Continuation-in-part of Ser. No. US 2004-828100, filed on 19 Apr 2004, GRANTED, Pat. No. US 7074294 Continuation-in-part of Ser. No. US 2004-825861, filed on 16 Apr 2004, ABANDONED Continuation-in-part of Ser. No. US 2003-661381, filed on 12 Sep 2003, GRANTED, Pat. No. US 7056409 Continuation-in-part of Ser. No. US 2004-833944, filed on 27 Apr 2004, PENDING Continuation-in-part of Ser. No. US 2004-840794, filed on 5 May 2004, PENDING Continuation-in-part of Ser. No. US 2004-792402, filed on 2 Mar 2004, PENDING
PRAI US 2004-549711P 20040302 (60)
US 2003-463766P 20030417 (60)
US 2003-466229P 20030428 (60)
US 2003-468390P 20030506 (60)
US 2003-468606P 20030505 (60)
DT Utility
FS APPLICATION
LN.CNT 5777
INCL INCLM: 428/292.100
NCL NCLM: 428/292.100
IC IPCI D04H0013-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 5 OF 77 USPATFULL on STN
Full Text
AN 2006:234418 USPATFULL
TI Bioceramic composite coatings and process for making same
IN Troczynski, Tomasz, Vancouver, CANADA
Yang, Quanzu, Vancouver, CANADA
PA The University of British Columbia, Vancouver, CANADA (non-U.S. corporation)
PI US 2006199876 A1 20060907
AI US 2005-71264 A1 20050304 (11)
DT Utility
FS APPLICATION
LN.CNT 1381
INCL INCLM: 523/115.000
NCL NCLM: 523/115.000
IC IPCI A61K0006-083 [I,A]; A61K0006-02 [I,C*]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 6 OF 77 USPATFULL on STN
Full Text
AN 2006:60230 USPATFULL
TI IFBMs to promote the specific attachment of target analytes to the surface of orthopedic implants
IN Beyer, Wayne F. JR., Bahama, NC, UNITED STATES
Hyde-DeRuyscher, Robin, Chapel Hill, NC, UNITED STATES
Hamilton, Paul T., Cary, NC, UNITED STATES

Benson, Ray Edward, Durham, NC, UNITED STATES
PA Affinergy, Inc., Research Triangle Park, NC, UNITED STATES (U.S. corporation)
PI US 2006051395 A1 20060309
AI US 2005-152974 A1 20050615 (11)
PRAI US 2004-580019P 20040616 (60)
US 2005-651338P 20050209 (60)
US 2005-651747P 20050210 (60)
DT Utility
FS APPLICATION
LN.CNT 4530
INCL INCLM: 424/423.000
INCLS: 514/002.000
NCL NCLM: 424/423.000
NCLS: 514/002.000
IC IPCI A61K0038-17 [I,A]; A61F0002-00 [I,A]
IPCR A61K0038-17 [I,A]; A61F0002-00 [I,C]; A61F0002-00 [I,A]; A61K0038-17 [I,C]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 7 OF 77 USPATFULL on STN
Full Text
AN 2006:15479 USPATFULL
TI Absorbable implants and methods for their use in hemostasis and in the treatment of osseous defects
IN Kronenthal, Richard L., Fairlawn, NJ, UNITED STATES
PI US 2006013857 A1 20060119
AI US 2005-224650 A1 20050912 (11)
RLI Continuation-in-part of Ser. No. US 2004-941890, filed on 16 Sep 2004, PENDING
PRAI US 2004-628989P 20041118 (60)
US 2003-504978P 20030923 (60)
DT Utility
FS APPLICATION
LN.CNT 1874
INCL INCLM: 424/426.000
NCL NCLM: 424/426.000
IC IPCI A61F0002-00 [I,A]
IPCR A61F0002-00 [I,A]; A61F0002-00 [I,C]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 8 OF 77 USPATFULL on STN
Full Text
AN 2005:254578 USPATFULL
TI Medical device applications of nanostructured surfaces
IN Dubrow, Robert S., San Carlos, CA, UNITED STATES
Sloan, L. Douglas, Santa Rosa, CA, UNITED STATES
Kronenthal, Richard L., Rutherford, NJ, UNITED STATES
Alfaro, Arthur A., Colts Neck, NJ, UNITED STATES
Collier, Matthew D., Los Altos, CA, UNITED STATES
Rogers, Erica J., Emerald Hills, CA, UNITED STATES
Gertner, Michael E., Menlo Park, CA, UNITED STATES
PA Nanosys, Inc., Palo Alto, CA, UNITED STATES, 94304 (U.S. corporation)
PI US 2005221072 A1 20051006
AI US 2005-90895 A1 20050324 (11)
RLI Continuation-in-part of Ser. No. US 2004-902700, filed on 29 Jul 2004, PENDING Continuation-in-part of Ser. No. US 2004-828100, filed on 19 Apr 2004, PENDING Continuation-in-part of Ser. No. US 2003-661381, filed on 12 Sep 2003, PENDING Continuation-in-part of Ser. No. US 2004-833944, filed on 27 Apr 2004, PENDING Continuation-in-part of Ser. No. US 2004-840794, filed on 5 May 2004, PENDING Continuation-in-part of Ser. No. US 2004-792402, filed on 2 Mar 2004, PENDING
PRAI US 2004-549711P 20040302 (60)
US 2003-463766P 20030417 (60)
US 2003-466229P 20030428 (60)
US 2003-468390P 20030506 (60)
US 2003-468606P 20030505 (60)
DT Utility
FS APPLICATION
LN.CNT 3909
INCL INCLM: 428/292.100
NCL NCLM: 428/292.100

IC [7]
ICM D04H003-00
IPCI D04H0003-00 [ICM,7]
IPCR D04H0003-00 [I,C*]; D04H0003-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 9 OF 77 USPATFULL on STN
Full Text
AN 2005:203823 USPATFULL
TI Scaffolds with viable **tissue**
IN Kladakis, Stephanie M., Watertown, MA, UNITED STATES
Dhanaraj, Sridevi, Raritan, NJ, UNITED STATES
Boock, Robert, Braintree, MA, UNITED STATES
PI US 2005177249 A1 20050811
AI US 2004-775034 A1 20040209 (10)
DT Utility
FS APPLICATION
LN.CNT 1262
INCL INCLM: 623/023.740
INCLS: 623/023.760
NCL NCLM: 623/023.740
NCLS: 623/023.760
IC [7]
ICM A61F002-02
IPCI A61F0002-02 [ICM,7]
IPCR A61L0027-00 [I,A]; A61F0002-00 [I,C*]; A61F0002-00 [I,A];
A61L0027-00 [I,C*]; A61L0027-36 [I,A]; A61L0027-48 [I,A];
A61L0027-56 [I,A]; A61L0027-58 [I,A]

L16 ANSWER 10 OF 77 USPATFULL on STN
Full Text
AN 2005:203819 USPATFULL
TI Absorbable orthopedic implants
IN Leatherbury, Neil C., San Antonio, TX, UNITED STATES
Dinger, Fred B. III, San Antonio, TX, UNITED STATES
Wrana, Jeffrey S., San Antonio, TX, UNITED STATES
Caborn, David, Goshen, KY, UNITED STATES
PI US 2005177245 A1 20050811
AI US 2005-52626 A1 20050207 (11)
PRAI US 2004-542640P 20040205 (60)
DT Utility
FS APPLICATION
LN.CNT 969
INCL INCLM: 623/023.500
INCLS: 623/023.510; 623/017.110
NCL NCLM: 623/023.500
NCLS: 623/017.110; 623/023.510
IC [7]
ICM A61F002-28
ICS A61F002-44
IPCI A61F0002-28 [ICM,7]; A61F0002-44 [ICS,7]
IPCR A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-44 [I,C*];
A61F0002-44 [I,A]

L16 ANSWER 11 OF 77 USPATFULL on STN
Full Text
AN 2005:157834 USPATFULL
TI Methods and compositions for **tissue** repair
IN Betz, Oliver B., Boston, MA, UNITED STATES
Betz, Volker M., Boston, MA, UNITED STATES
Evans, Christopher H., Cohasset, MA, UNITED STATES
PI US 2005136042 A1 20050623
AI US 2004-917265 A1 20040811 (10)
PRAI US 2003-494484P 20030812 (60)
DT Utility
FS APPLICATION
LN.CNT 3417
INCL INCLM: 424/093.210
INCLS: 435/455.000; 435/456.000; 435/366.000
NCL NCLM: 424/093.210
NCLS: 435/366.000; 435/455.000; 435/456.000
IC [7]

ICM A61K048-00
ICS C12N005-08; C12N015-86
IPCI A61K0048-00 [ICM,7]; C12N0005-08 [ICS,7]; C12N0015-86 [ICS,7]
IPCR A61K0048-00 [I,C*]; A61K0048-00 [I,A]; C12N0005-08 [I,C*];
C12N0005-08 [I,A]; C12N0015-86 [I,C*]; C12N0015-86 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 12 OF 77 USPATFULL on STN
Full Text
AN 2005:145336 USPATFULL
TI Viable **tissue** repair implants and methods of use
IN Harmon, Alexander M., Clinton, NJ, UNITED STATES
Kladakis, Stephanie M., Watertown, MA, UNITED STATES
Hwang, Julia, Wayland, MA, UNITED STATES
PI US 2005125077 A1 20050609
AI US 2003-729046 A1 20031205 (10)
DT Utility
FS APPLICATION
LN.CNT 1723
INCL INCLM: 623/023.720
INCLS: 435/401.000
NCL NCLM: 623/023.720
NCLS: 435/401.000
IC [7]
ICM A61F002-02
ICS C12N005-08
IPCI A61F0002-02 [ICM,7]; C12N0005-08 [ICS,7]
IPCR A61L0027-00 [I,A]; A61F0002-08 [I,C*]; A61F0002-08 [I,A];
A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61L0027-00 [I,C*];
A61L0027-38 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 13 OF 77 USPATFULL on STN
Full Text
AN 2005:137585 USPATFULL
TI Methods and compositions for regenerating connective **tissue**
IN Hill, Ronald Stewart, Greenville, NC, UNITED STATES
Klann, Richard Chris, Washington, NC, UNITED STATES
Lamberti, Francis V., Greenville, NC, UNITED STATES
PA Encelle, Inc. (U.S. corporation)
PI US 2005118230 A1 20050602
AI US 2004-971544 A1 20041022 (10)
PRAI US 2003-513392P 20031022 (60)
DT Utility
FS APPLICATION
LN.CNT 2047
INCL INCLM: 424/426.000
INCLS: 514/008.000; 514/021.000; 424/093.700
NCL NCLM: 424/426.000
NCLS: 424/093.700; 514/008.000; 514/021.000
IC [7]
ICM A61K038-38
ICS A61K045-00
IPCI A61K0038-38 [ICM,7]; A61K0045-00 [ICS,7]
IPCR A61K0038-18 [I,C*]; A61K0038-18 [I,A]; A61K0038-19 [I,C*];
A61K0038-19 [I,A]; A61K0038-30 [I,C*]; A61K0038-30 [I,A];
A61K0038-38 [I,C*]; A61K0038-38 [I,A]; A61K0038-39 [I,C*];
A61K0038-39 [I,A]; A61K0045-00 [I,C*]; A61K0045-00 [I,A];
A61L0027-00 [I,C*]; A61L0027-48 [I,A]; A61L0027-52 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 14 OF 77 USPATFULL on STN
Full Text
AN 2005:75913 USPATFULL
TI Absorbable implants and methods for their use in hemostasis and in the
treatment of osseous defects
IN Kronenthal, Richard L., Fair Lawn, NJ, UNITED STATES
PI US 2005065214 A1 20050324
AI US 2004-941890 A1 20040916 (10)
PRAI US 2003-504978P 20030923 (60)
DT Utility
FS APPLICATION

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LN.CNT 2741
INCL    INCLM: 514/557.000
        INCLS: 424/464.000
NCL     NCLM:  514/557.000
        NCLS:  424/464.000
IC      [7]
        ICM    A61K009-20
        ICS    A61K031-19
        IPCI   A61K0009-20 [ICM,7]; A61K0031-19 [ICS,7]; A61K0031-185 [ICS,7,C*]
        IPCR   A61K0031-185 [I,C*]; A61K0031-19 [I,A]; A61L0024-00 [I,C*];
               A61L0024-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 15 OF 77  USPATFULL on STN
Full Text
AN      2005:59069  USPATFULL
TI      Osteogenic implants derived from bone
IN      Boyce, Todd M., Aberdeen, NJ, United States
        Kaes, David, Toms River, NJ, United States
        Scarborough, Nelson L., Ocean, NJ, United States
PA      Osteotech, Inc., Eatontown, NJ, United States (U.S. corporation)
PI      US 6863694          B1  20050308
AI      US 2000-610026          20000703 (9)
DT      Utility
FS      GRANTED
LN.CNT 1330
INCL    INCLM: 623/023.630
        INCLS: 623/023.610
NCL     NCLM:  623/023.630
        NCLS:  623/023.610
IC      [7]
        ICM    A61F002-28
        IPCI   A61F0002-28 [ICM,7]
        IPCR   A61L0027-00 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A];
               A61L0027-00 [I,C*]; A61L0027-36 [I,A]
EXF     623/23.61; 623/23.63; 523/113; 523/115; 435/372

L16  ANSWER 16 OF 77  USPATFULL on STN
Full Text
AN      2005:44785  USPATFULL
TI      Method and apparatus for resurfacing an articular surface
IN      Binette, Francois, Weymouth, MA, UNITED STATES
        Lu, Ed Yiling, Chestnut Hill, MA, UNITED STATES
PI      US 2005038520       A1  20050217
AI      US 2003-638562      A1  20030811 (10)
DT      Utility
FS      APPLICATION
LN.CNT 1616
INCL    INCLM: 623/018.110
        INCLS: 623/023.610; 623/908.000
NCL     NCLM:  623/018.110
        NCLS:  623/023.610; 623/908.000
IC      [7]
        ICM    A61F002-08
        IPCI   A61F0002-08 [ICM,7]
        IPCR   A61L0027-00 [I,A]; A61B0017-00 [N,C*]; A61B0017-00 [N,A];
               A61B0017-064 [N,C*]; A61B0017-064 [N,A]; A61F0002-00 [N,C*];
               A61F0002-00 [N,A]; A61F0002-02 [N,C*]; A61F0002-02 [N,A];
               A61F0002-30 [I,C*]; A61F0002-30 [I,A]; A61F0002-38 [N,C*];
               A61F0002-38 [N,A]; A61L0027-00 [I,C*]; A61L0027-36 [I,A];
               A61L0027-38 [I,A]

L16  ANSWER 17 OF 77  USPATFULL on STN
Full Text
AN      2005:44763  USPATFULL
TI      Medical device applications of nanostructured surfaces
IN      Dubrow, Robert S., San Carlos, CA, UNITED STATES
        Sloan, L. Douglas, Santa Rosa, CA, UNITED STATES
        Kronenthal, Richard L., Fair Lawn, NJ, UNITED STATES
        Alfaro, Arthur A., Cots Neck, NJ, UNITED STATES
        Collier, Matthew D., Los Altos, CA, UNITED STATES
        Rogers, Erica J., Emerald Hills, CA, UNITED STATES
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Gertner, Michael E., Menlo Park, CA, UNITED STATES
PA Nanosys, Inc., Palo Alto, CA, UNITED STATES, 94304 (U.S. corporation)
PI US 2005038498 A1 20050217
AI US 2004-902700 A1 20040729 (10)
RLI Continuation-in-part of Ser. No. US 2004-828100, filed on 19 Apr 2004, PENDING Continuation-in-part of Ser. No. US 2003-661381, filed on 12 Sep 2003, PENDING Continuation-in-part of Ser. No. US 2004-833944, filed on 27 Apr 2004, PENDING Continuation-in-part of Ser. No. US 2004-840794, filed on 5 May 2004, PENDING Continuation-in-part of Ser. No. US 2004-792402, filed on 2 Mar 2004, PENDING
PRAI US 2004-549711P 20040302 (60)
US 2003-463766P 20030417 (60)
US 2003-466229P 20030428 (60)
US 2003-468390P 20030506 (60)
US 2003-468606P 20030505 (60)
DT Utility
FS APPLICATION
LN.CNT 3602
INCL INCLM: 623/001.150
INCLS: 606/153.000
NCL NCLM: 623/001.150
NCLS: 606/153.000
IC [7]
ICM A61F002-06
ICS A61B017-08
IPCI A61F0002-06 [ICM,7]; A61B0017-08 [ICS,7]; A61B0017-03 [ICS,7,C*]
IPCR A61B0017-03 [I,C*]; A61B0017-08 [I,A]; A61F0002-06 [I,C*]; A61F0002-06 [I,A]

L16 ANSWER 18 OF 77 USPATFULL on STN
Full Text
AN 2005:37028 USPATFULL
TI Antimicrobial, water-insoluble silicate glass powder and mixture of glass powders
IN Beier, Wolfram, Essenheim, GERMANY, FEDERAL REPUBLIC OF
Fechner, Jorg Hinrich, Mainz, GERMANY, FEDERAL REPUBLIC OF
Schnell, Rupert, Worms, GERMANY, FEDERAL REPUBLIC OF
Zimmer, Jose, Ingelheim, GERMANY, FEDERAL REPUBLIC OF
PA Schott Glas (non-U.S. corporation)
PI US 2005031703 A1 20050210
AI US 2004-897689 A1 20040723 (10)
RLI Continuation of Ser. No. WO 2003-EP559, filed on 21 Jan 2003, UNKNOWN
PRAI DE 2002-10202630 20020124
DT Utility
FS APPLICATION
LN.CNT 414
INCL INCLM: 424/601.000
INCLS: 501/077.000; 424/618.000
NCL NCLM: 424/601.000
NCLS: 424/618.000; 501/077.000
IC [7]
ICM A61K033-42
ICS C03C003-118; C03C003-064; A61K033-38
IPCI A61K0033-42 [ICM,7]; C03C0003-118 [ICS,7]; C03C0003-076 [ICS,7,C*]; C03C0003-064 [ICS,7]; C03C0003-062 [ICS,7,C*]; A61K0033-38 [ICS,7]
IPCR A61L0029-00 [I,C*]; A61L0029-00 [I,A]; A01N0059-16 [I,C*]; A01N0059-16 [I,A]; C03C0003-062 [I,C*]; C03C0003-062 [I,A]; C03C0003-064 [I,A]; C03C0003-066 [I,A]; C03C0003-076 [I,C*]; C03C0003-078 [I,A]; C03C0003-085 [I,A]; C03C0003-087 [I,A]; C03C0003-089 [I,A]; C03C0003-091 [I,A]; C03C0003-093 [I,A]; C03C0003-097 [I,A]; C03C0004-00 [I,C*]; C03C0004-00 [I,A]; C03C0008-00 [I,C*]; C03C0008-22 [I,A]; C03C0012-00 [I,C*]; C03C0012-00 [I,A]; C09D0005-14 [I,C*]; C09D0005-14 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 19 OF 77 USPATFULL on STN
Full Text
AN 2004:336264 USPATFULL
TI Scaffold for connective **tissue** repair
IN Hwang, Julia, Wayland, MA, UNITED STATES
Hammer, Joseph, Bridgewater, NJ, UNITED STATES

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       Schwartz, Herb, Fort Wayne, IN, UNITED STATES
       Malaviya, Prasanna, Fort Wayne, IN, UNITED STATES
PI     US 2004267362       A1  20041230
AI     US 2003-610362      A1  20030630 (10)
DT     Utility
FS     APPLICATION
LN.CNT 1532
INCL   INCLM: 623/013.150
       INCLS: 623/013.170; 623/013.190; 623/013.180
NCL    NCLM:  623/013.150
       NCLS:  623/013.170; 623/013.180; 623/013.190
IC     [7]
       ICM    A61F002-08
       IPCI   A61F0002-08 [ICM,7]
       IPCR   A61L0027-00 [I,A]; A61F0002-08 [I,C*]; A61F0002-08 [I,A];
              A61L0027-00 [I,C*]; A61L0027-18 [I,A]; A61L0027-36 [I,A];
              A61L0027-56 [I,A]

L16  ANSWER 20 OF 77  USPATFULL on STN
Full Text
AN     2004:336166  USPATFULL
TI     Porous resorbable graft fixation pin
IN     May, Thomas, Wrentham, MA, UNITED STATES
PA     ETHICON, INC., Somerville, NJ (U.S. corporation)
PI     US 2004267263       A1  20041230
AI     US 2003-602797      A1  20030624 (10)
DT     Utility
FS     APPLICATION
LN.CNT 731
INCL   INCLM: 606/072.000
NCL    NCLM:  606/072.000
IC     [7]
       ICM    A61B017-56
       IPCI   A61B0017-56 [ICM,7]
       IPCR   A61B0017-56 [I,C*]; A61B0017-56 [I,A]; A61B0017-00 [N,C*];
              A61B0017-00 [N,A]; A61B0017-68 [I,C*]; A61B0017-84 [I,A];
              A61B0017-86 [I,A]

L16  ANSWER 21 OF 77  USPATFULL on STN
Full Text
AN     2004:315338  USPATFULL
TI     Method of manufacturing dental restorations
IN     Jia, Weitao, Wallingford, CT, UNITED STATES
       Jin, Shuhua, Wallingford, CT, UNITED STATES
PI     US 2004249015       A1  20041209
AI     US 2004-862177      A1  20040604 (10)
RLI    Division of Ser. No. US 2001-5298, filed on 5 Dec 2001, GRANTED, Pat.
       No. US 6787584 Continuation-in-part of Ser. No. US 2000-638206, filed on
       11 Aug 2000, GRANTED, Pat. No. US 6455608
PRAI   US 2000-251408P     20001205 (60)
DT     Utility
FS     APPLICATION
LN.CNT 747
INCL   INCLM: 523/115.000
NCL    NCLM:  523/115.000
IC     [7]
       ICM    A61F002-00
       IPCI   A61F0002-00 [ICM,7]
       IPCR   A61K0006-00 [I,C*]; A61K0006-00 [I,A]; A61K0006-02 [I,C*];
              A61K0006-083 [I,A]; A61L0024-00 [I,C*]; A61L0024-04 [I,A];
              A61L0027-00 [I,C*]; A61L0027-44 [I,A]; A61L0027-46 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 22 OF 77  USPATFULL on STN
Full Text
AN     2004:308455  USPATFULL
TI     Method and system for manufacturing biomedical articles, such as using
       biomedically compatible infiltrant metal alloys in porous matrices
IN     Materna, Peter A., Metuchen, NJ, UNITED STATES
PA     Therics, Inc., Princeton, NJ (U.S. corporation)
PI     US 2004243133       A1  20041202
AI     US 2004-794802      A1  20040305 (10)
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PRAI US 2003-452795P 20030305 (60)
DT Utility
FS APPLICATION
LN.CNT 1234
INCL INCLM: 606/076.000
INCLS: 420/417.000; 420/422.000; 420/425.000; 623/023.550; 623/023.500
NCL NCLM: 606/076.000
NCLS: 420/417.000; 420/422.000; 420/425.000; 623/023.500; 623/023.550
IC [7]
ICM A61F002-28
ICS C22C014-00
IPCI A61F0002-28 [ICM,7]; C22C0014-00 [ICS,7]
IPCR A61L0027-00 [I,C*]; A61L0027-04 [I,A]; A61L0027-42 [I,A];
C04B0041-45 [I,C*]; C04B0041-51 [I,A]; C04B0041-88 [I,C*];
C04B0041-88 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 23 OF 77 USPATFULL on STN
Full Text
AN 2004:293217 USPATFULL
TI In-situ formed intervertebral fusion device and method
IN DiMauro, Thomas M., Southboro, MA, UNITED STATES
Slivka, Michael Andrew, Taunton, MA, UNITED STATES
Malone, John Daniel, Cumberland, RI, UNITED STATES
Moore, Bradley Thomas, Barrington, RI, UNITED STATES
Serhan, Hassan, South Easton, MA, UNITED STATES
Kadiyala, Sudhakar, South Easton, MA, UNITED STATES
Bartish, Charles M., JR., Providence, RI, UNITED STATES
Woodrow, Hal Brent, Princeton, NJ, UNITED STATES
Rohr, William L., Palm Beach Gardens, FL, UNITED STATES
Kelly, James Edward, North Easton, MA, UNITED STATES
Cooper, Kevin, Flemington, NJ, UNITED STATES
Aquino, Lauren, Boston, MA, UNITED STATES
PA DePuy Spine, Inc., Raynham, MA (U.S. corporation)
PI US 2004230309 A1 20041118
AI US 2004-778684 A1 20040213 (10)
PRAI US 2003-448221P 20030214 (60)
DT Utility
FS APPLICATION
LN.CNT 5024
INCL INCLM: 623/017.120
INCLS: 623/017.110
NCL NCLM: 623/017.120
NCLS: 623/017.110
IC [7]
ICM A61F002-44
ICS A61F002-46
IPCI A61F0002-44 [ICM,7]; A61F0002-46 [ICS,7]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-02 [N,C*];
A61F0002-02 [N,A]; A61F0002-28 [N,C*]; A61F0002-28 [N,A];
A61F0002-30 [N,C*]; A61F0002-30 [N,A]; A61F0002-44 [I,C*];
A61F0002-44 [I,A]; A61F0002-46 [I,C*]; A61F0002-46 [I,A];
A61L0027-00 [I,C*]; A61L0027-18 [I,A]; A61L0027-50 [I,A];
A61L0027-54 [I,A]

L16 ANSWER 24 OF 77 USPATFULL on STN
Full Text
AN 2004:291824 USPATFULL
TI Anti-inflammatory and antimicrobial uses for **bioactive glass** compositions
IN Greenspan, David C., Gainesville, FL, UNITED STATES
West, Jon K., Gainesville, FL, UNITED STATES
Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
Meyers, James L., Gainesville, FL, UNITED STATES
Diamond, Mason, Gainesville, FL, UNITED STATES
PI US 2004228905 A1 20041118
AI US 2004-865636 A1 20040610 (10)
RLI Continuation of Ser. No. US 2000-560046, filed on 27 Apr 2000, GRANTED, Pat. No. US 6756060 Continuation-in-part of Ser. No. US 1998-164293, filed on 1 Oct 1998, GRANTED, Pat. No. US 6428800 Continuation of Ser. No. US 1996-715911, filed on 19 Sep 1996, GRANTED, Pat. No. US 5834008 Continuation of Ser. No. US 1999-392516, filed on 9 Sep 1999, ABANDONED

PRAI US 1998-99725P 19980910 (60)
DT Utility
FS APPLICATION
LN.CNT 1072
INCL INCLM: 424/445.000
INCLS: 424/617.000; 514/035.000; 514/152.000
NCL NCLM: 424/445.000
NCLS: 424/617.000; 514/035.000; 514/152.000
IC [7]
ICM A61K033-24
ICS A61K009-14; A61K031-65
IPCI A61K0033-24 [ICM,7]; A61K0009-14 [ICS,7]; A61K0031-65 [ICS,7]
IPCR A61K0008-19 [I,C*]; A61K0008-25 [I,A]; A61K0045-00 [I,C*];
A61K0045-06 [I,A]; A61L0015-16 [I,C*]; A61L0015-18 [I,A];
A61L0015-44 [I,A]; A61L0015-46 [I,A]; A61Q0001-02 [I,C*];
A61Q0001-02 [I,A]; A61Q0005-00 [I,C*]; A61Q0005-00 [I,A];
A61Q0019-00 [I,C*]; A61Q0019-00 [I,A]; C03C0004-00 [I,C*];
C03C0004-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 25 OF 77 USPATFULL on STN
Full Text
AN 2004:215066 USPATFULL
TI Bioctive **tissue** abrasives
IN Rosati, Coni, Encinitas, CA, UNITED STATES
Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
Zimmer, Jose, Ingelheim, GERMANY, FEDERAL REPUBLIC OF
PI US 2004166172 A1 20040826
AI US 2003-673596 A1 20030929 (10)
RLI Continuation-in-part of Ser. No. US 2001-818466, filed on 27 Mar 2001,
PENDING
DT Utility
FS APPLICATION
LN.CNT 568
INCL INCLM: 424/601.000
INCLS: 501/063.000
NCL NCLM: 424/601.000
NCLS: 501/063.000
IC [7]
ICM A61K033-42
ICS C03C003-097
IPCI A61K0033-42 [ICM,7]; C03C0003-097 [ICS,7]; C03C0003-076
[ICS,7,C*]
IPCR A61K0008-19 [I,C*]; A61K0008-22 [I,A]; A61Q0011-00 [I,C*];
A61Q0011-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 26 OF 77 USPATFULL on STN
Full Text
AN 2004:204438 USPATFULL
TI Surface treated metallic implant and blasting material
IN Muller, Wolf-Dieter, Berlin, GERMANY, FEDERAL REPUBLIC OF
Berger, Georg, Zepernick, GERMANY, FEDERAL REPUBLIC OF
PI US 2004158330 A1 20040812
AI US 2003-480918 A1 20031215 (10)
WO 2002-DE2229 20020614
PRAI DE 2001-10129843 20010615
DT Utility
FS APPLICATION
LN.CNT 474
INCL INCLM: 623/023.570
INCLS: 623/023.560; 501/010.000
NCL NCLM: 623/023.570
NCLS: 501/010.000; 623/023.560
IC [7]
ICM A61F002-28
IPCI A61F0002-28 [ICM,7]
IPCR A61L0027-00 [I,C*]; A61L0027-30 [I,A]; A61L0027-32 [I,A];
A61L0027-42 [I,A]; B24C0001-00 [I,C*]; B24C0001-06 [I,A];
B24C0011-00 [I,C*]; B24C0011-00 [I,A]; C03C0004-00 [I,C*];
C03C0004-00 [I,A]; C03C0010-00 [I,C*]; C03C0010-16 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 27 OF 77 USPATFULL on STN
Full Text
AN 2004:196441 USPATFULL
TI **Tissue** abrasives
IN Zimmer, Jose, Ingelheim, GERMANY, FEDERAL REPUBLIC OF
Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
Rosati, Coni, Encinitas, CA, UNITED STATES
PI US 2004151745 A1 20040805
AI US 2003-696878 A1 20031030 (10)
RLI Continuation-in-part of Ser. No. US 2003-673596, filed on 29 Sep 2003, PENDING Continuation-in-part of Ser. No. US 2001-818466, filed on 27 Mar 2001, PENDING
DT Utility
FS APPLICATION
LN.CNT 816
INCL INCLM: 424/401.000
NCL NCLM: 424/401.000
IC [7]
ICM A61K007-00
IPCI A61K0007-00 [ICM,7]
IPCR A61K0008-19 [I,C*]; A61K0008-22 [I,A]; A61Q0011-00 [I,C*]; A61Q0011-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 28 OF 77 USPATFULL on STN
Full Text
AN 2004:161242 USPATFULL
TI Anti-inflammatory and antimicrobial uses for **bioactive glass** compositions
IN Greenspan, David C., Gainesville, FL, United States
West, Jon K., Gainesville, FL, United States
Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
Meyers, James L., Gainesville, FL, United States
Diamond, Mason, Gainesville, FL, United States
PA USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)
PI US 6756060 B1 20040629
AI US 2000-560046 20000427 (9)
RLI Continuation-in-part of Ser. No. US 1998-164293, filed on 1 Oct 1998, now patented, Pat. No. US 6428800 Continuation of Ser. No. US 1996-715911, filed on 19 Sep 1996, now patented, Pat. No. US 5834008 Continuation of Ser. No. US 1999-392516, filed on 9 Sep 1999, now abandoned
PRAI US 1998-99725P 19980910 (60)
DT Utility
FS GRANTED
LN.CNT 1100
INCL INCLM: 424/489.000
INCLS: 424/400.000; 424/401.000; 424/402.000; 424/404.000; 424/405.000; 424/443.000; 424/445.000; 424/446.000; 424/447.000; 424/484.000; 424/601.000; 424/602.000; 424/606.000; 424/657.000; 424/660.000; 424/675.000; 424/688.000; 424/692.000; 424/722.000; 424/724.000; 424/DIG.013; 514/829.000; 514/830.000; 514/831.000; 514/859.000; 514/861.000; 514/862.000; 514/863.000; 514/864.000; 514/886.000; 514/887.000; 514/951.000; 514/965.000
NCL NCLM: 424/489.000
NCLS: 424/400.000; 424/401.000; 424/402.000; 424/404.000; 424/405.000; 424/443.000; 424/445.000; 424/446.000; 424/447.000; 424/484.000; 424/601.000; 424/602.000; 424/606.000; 424/657.000; 424/660.000; 424/675.000; 424/688.000; 424/692.000; 424/722.000; 424/724.000; 424/DIG.013; 514/829.000; 514/830.000; 514/831.000; 514/859.000; 514/861.000; 514/862.000; 514/863.000; 514/864.000; 514/886.000; 514/887.000; 514/951.000; 514/965.000
IC [7]
ICM A61K009-14
ICS A61K033-00; A61K033-06; A61K033-08; A61K033-16
IPCI A61K0009-14 [ICM,7]; A61K0033-00 [ICS,7]; A61K0033-06 [ICS,7]; A61K0033-08 [ICS,7]; A61K0033-06 [ICS,7,C*]; A61K0033-16 [ICS,7]
IPCR A61K0008-19 [I,C*]; A61K0008-25 [I,A]; A61K0045-00 [I,C*]; A61K0045-06 [I,A]; A61L0015-16 [I,C*]; A61L0015-18 [I,A]; A61L0015-44 [I,A]; A61L0015-46 [I,A]; A61Q0001-02 [I,C*]; A61Q0001-02 [I,A]; A61Q0005-00 [I,C*]; A61Q0005-00 [I,A];

A61Q0019-00 [I,C*]; A61Q0019-00 [I,A]; C03C0004-00 [I,C*];
C03C0004-00 [I,A]
EXF 424/400; 424/401; 424/484; 424/489; 424/601-602; 424/606; 424/657; 424/660; 424/675; 424/688; 424/692; 424/722; 424/724; 424/402; 424/404; 424/405; 424/443; 424/445; 424/446; 424/447; 424/DIG.13; 623/11.11; 514/829-831; 514/859; 514/861; 514/862; 514/863; 514/864; 514/886; 514/887; 514/951; 514/965; 602/41-45; 604/304; 604/305; 604/309; 604/310; 604/311; 604/903
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 29 OF 77 USPATFULL on STN
Full Text
AN 2004:102220 USPATFULL
TI Biocompatible scaffolds with **tissue** fragments
IN Binette, Francois, Weymouth, MA, UNITED STATES
Hwang, Julia, Wayland, MA, UNITED STATES
Dhanaraj, Sridevi, Raritan, NJ, UNITED STATES
Gosiewska, Anna, Skilman, NJ, UNITED STATES
PI US 2004078090 A1 20040422
AI US 2003-374772 A1 20030225 (10)
PRAI US 2002-420093P 20021018 (60)
US 2002-419539P 20021018 (60)
DT Utility
FS APPLICATION
LN.CNT 2319
INCL INCLM: 623/023.760
INCLS: 435/395.000
NCL NCLM: 623/023.760
NCLS: 435/395.000
IC [7]
ICM A61F002-02
IPCI A61F0002-02 [ICM,7]
IPCR A61L0027-00 [I,A]; A61F0002-08 [I,C*]; A61F0002-08 [I,A]; A61F0002-10 [I,C*]; A61F0002-10 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-30 [I,C*]; A61F0002-30 [I,A]; A61L0027-00 [I,C*]; A61L0027-36 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 30 OF 77 USPATFULL on STN
Full Text
AN 2004:102207 USPATFULL
TI Biocompatible scaffold for ligament or tendon repair
IN Binette, Francois, Weymouth, MA, UNITED STATES
Hwang, Julia, Watertown, MA, UNITED STATES
Zimmerman, Mark, East Brunswick, NJ, UNITED STATES
Melican, Mora Carolynne, Bridgewater, NJ, UNITED STATES
PI US 2004078077 A1 20040422
AI US 2003-374754 A1 20030225 (10)
PRAI US 2002-420093P 20021018 (60)
US 2002-419539P 20021018 (60)
DT Utility
FS APPLICATION
LN.CNT 1934
INCL INCLM: 623/013.170
NCL NCLM: 623/013.170
IC [7]
ICM A61F002-08
IPCI A61F0002-08 [ICM,7]
IPCR A61L0027-00 [I,A]; A61F0002-08 [I,C*]; A61F0002-08 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61L0027-00 [I,C*]; A61L0027-36 [I,A]

L16 ANSWER 31 OF 77 USPATFULL on STN
Full Text
AN 2004:71143 USPATFULL
TI Biodegradable composites
IN Corden, Thomas Joseph, Nottingham, UNITED KINGDOM
Downes, Sandra, Nottingham, UNITED KINGDOM
Fisher, Sheila Eunice, Nottingham, UNITED KINGDOM
Jones, Ivor Arthur, Nottingham, UNITED KINGDOM
Rudd, Christopher Douglas, Nottingham, UNITED KINGDOM
PA BTG International Limited (non-U.S. corporation)

PI US 2004054372 A1 20040318
AI US 2003-625524 A1 20030724 (10)
RLI Division of Ser. No. US 2000-506363, filed on 18 Feb 2000, ABANDONED
Continuation of Ser. No. WO 1998-GB2399, filed on 19 Aug 1998, UNKNOWN
PRAI GB 1997-17433 19970819
DT Utility
FS APPLICATION
LN.CNT 1089
INCL INCLM: 606/077.000
INCLS: 435/398.000
NCL NCLM: 606/077.000
NCLS: 435/398.000
IC [7]
ICM A61F002-28
ICS A61F002-02
IPCI A61F0002-28 [ICM,7]; A61F0002-02 [ICS,7]
IPCR A61L0027-00 [I,C*]; A61L0027-44 [I,A]; A61L0027-48 [I,A];
A61L0027-58 [I,A]; B29C0033-38 [I,C*]; B29C0033-38 [I,A];
B29C0070-04 [I,C*]; B29C0070-48 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 32 OF 77 USPATFULL on STN
Full Text
AN 2004:41271 USPATFULL
TI Bone repair composite material
IN Healy, David Michael, Ayr, UNITED KINGDOM
Gilchrist, Thomas, Ayr, UNITED KINGDOM
PA Fite Holdings Limited, Glasgow, UNITED KINGDOM (non-U.S. corporation)
PI US 6692532 B1 20040217
WO 2000016819 20000330
AI US 2001-787384 20010518 (9)
WO 1999-GB3077 19990915
PRAI GB 1998-20369 19980919
DT Utility
FS GRANTED
LN.CNT 805
INCL INCLM: 623/023.510
INCLS: 623/023.560; 623/023.610; 623/023.630
NCL NCLM: 623/023.510
NCLS: 623/023.560; 623/023.610; 623/023.630
IC [7]
ICM A61F002-28
IPCI A61F0002-28 [ICM,7]
IPCR A61L0027-00 [I,A]; A61L0024-00 [I,C*]; A61L0024-00 [I,A];
A61L0027-00 [I,C*]; A61L0027-10 [I,A]; A61L0027-36 [I,A];
A61L0027-42 [I,A]
EXF 623/23.51; 623/23.61; 623/23.71; 623/23.73; 623/11.11; 623/16.11;
623/23.63; 623/23.56; 623/23.62; 623/17.11; 523/115; 523/116

L16 ANSWER 33 OF 77 USPATFULL on STN
Full Text
AN 2004:13078 USPATFULL
TI Use of **bioactive glass** compositions to stimulate osteoblast production
IN Hench, Larry L, London, UNITED KINGDOM
Polak, Julia M, London, UNITED KINGDOM
Buttery, Lee D.k., London, UNITED KINGDOM
Xynos, Ioannis D, Nafplion, GREECE
Maroothynaden, Jason, London, UNITED KINGDOM
PI US 2004009598 A1 20040115
AI US 2003-332731 A1 20030707 (10)
WO 2001-US21801 20010711
DT Utility
FS APPLICATION
LN.CNT 1301
INCL INCLM: 435/375.000
INCLS: 435/395.000
NCL NCLM: 435/375.000
NCLS: 435/395.000
IC [7]
ICM C12N005-00
ICS C12N005-02
IPCI C12N0005-00 [ICM,7]; C12N0005-02 [ICS,7]

IPCR C12N0005-02 [I,C*]; C12N0005-02 [I,A]; C12N0005-06 [I,C*];
C12N0005-06 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 34 OF 77 USPATFULL on STN
Full Text
AN 2004:2747 USPATFULL
TI Polymer-bioceramic composite for orthopaedic applications and method of manufacture thereof
IN King, Richard S., Warsaw, IN, UNITED STATES
Smith, Todd S., Fort Wayne, IN, UNITED STATES
PI US 2004002770 A1 20040101
AI US 2003-449058 A1 20030602 (10)
PRAI US 2002-392488P 20020628 (60)
DT Utility
FS APPLICATION
LN.CNT 856
INCL INCLM: 623/023.510
INCLS: 424/425.000; 264/273.000
NCL NCLM: 623/023.510
NCLS: 264/273.000; 424/425.000
IC [7]
ICM A61F002-28
IPCI A61F0002-28 [ICM,7]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-02 [N,C*];
A61F0002-02 [N,A]; A61F0002-28 [N,C*]; A61F0002-28 [N,A];
A61F0002-30 [N,C*]; A61F0002-30 [N,A]; A61L0027-00 [I,C*];
A61L0027-42 [I,A]; A61L0027-46 [I,A]; A61L0027-54 [I,A];
A61L0027-56 [I,A]; A61L0027-58 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 35 OF 77 USPATFULL on STN
Full Text
AN 2003:330531 USPATFULL
TI Cross-linked bioactive hydrogel matrices
IN Lamberti, Francis V., Greenville, NC, UNITED STATES
Klann, Richard Chris, Washington, NC, UNITED STATES
Hill, Ronald Stewart, Greenville, NC, UNITED STATES
PA Encelle, Inc. (U.S. corporation)
PI US 2003232746 A1 20031218
AI US 2003-372643 A1 20030221 (10)
PRAI US 2002-358625P 20020221 (60)
DT Utility
FS APPLICATION
LN.CNT 1495
INCL INCLM: 514/002.000
INCLS: 514/054.000; 514/055.000; 514/056.000; 514/057.000; 514/060.000;
514/059.000; 424/488.000; 514/561.000
NCL NCLM: 514/002.000
NCLS: 424/488.000; 514/054.000; 514/055.000; 514/056.000; 514/057.000;
514/059.000; 514/060.000; 514/561.000
IC [7]
ICM A61K038-17
ICS A61K031-737; A61K031-728; A61K031-727; A61K031-717; A61K031-718;
A61K031-721; A61K031-722; A61K031-195; A61K009-14; A61K031-198
IPCI A61K0038-17 [ICM,7]; A61K0031-737 [ICS,7]; A61K0031-728 [ICS,7];
A61K0031-727 [ICS,7]; A61K0031-726 [ICS,7,C*]; A61K0031-717
[ICS,7]; A61K0031-718 [ICS,7]; A61K0031-721 [ICS,7]; A61K0031-722
[ICS,7]; A61K0031-716 [ICS,7,C*]; A61K0031-195 [ICS,7];
A61K0009-14 [ICS,7]; A61K0031-198 [ICS,7]; A61K0031-185
[ICS,7,C*]
IPCR A61L0027-00 [I,C*]; A61L0027-52 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 36 OF 77 USPATFULL on STN
Full Text
AN 2003:329987 USPATFULL
TI Immobilized bioactive hydrogel matrices as surface coatings
IN Lamberti, Francis V., Greenville, NC, UNITED STATES
Klann, Richard Chris, Washington, NC, UNITED STATES
Hill, Ronald Stewart, Greenville, NC, UNITED STATES
PA Encelle, Inc. (U.S. corporation)

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PI     US 2003232198       A1  20031218
AI     US 2003-372757      A1  20030221 (10)
PRAI   US 2002-358625P     20020221 (60)
DT     Utility
FS     APPLICATION
LN.CNT 1443
INCL   INCLM: 428/423.100
       INCLS: 428/480.000
NCL    NCLM:  428/423.100
       NCLS:  428/480.000
IC     [7]
       ICM    B32B027-00
       IPCI   B32B0027-00 [ICM,7]
       IPCR   A61L0027-00 [I,C*]; A61L0027-34 [I,A]; A61L0031-08 [I,C*];
              A61L0031-10 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 37 OF 77  USPATFULL on STN
Full Text
AN     2003:293916  USPATFULL
TI     BIOACTIVE, BIOABSORBABLE SURGICAL POLYETHYLENE GLYCOL AND POLYBUTYLENE
       TEREPHTALATE COPOLYMER COMPOSITES AND DEVICES
IN     TORMALA, PERTTI, TAMPERE, FINLAND
       KELLOMAKI, MINNA, TAMPERE, FINLAND
PI     US 2003206928       A1  20031106
AI     US 1999-287925      A1  19990407 (9)
DT     Utility
FS     APPLICATION
LN.CNT 876
INCL   INCLM: 424/400.000
NCL    NCLM:  424/400.000
IC     [7]
       ICM    A61K031-765
       ICS    A61F002-00
       IPCI   A61K0031-765 [ICM,7]; A61K0031-74 [ICM,7,C*]; A61F0002-00 [ICS,7]
       IPCR   A61L0031-00 [I,C*]; A61L0031-00 [I,A]; A61L0031-12 [I,C*];
              A61L0031-12 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 38 OF 77  USPATFULL on STN
Full Text
AN     2003:250624  USPATFULL
TI     Method and apparatus for preparing biomimetic scaffold
IN     Campbell, Phil G., Pittsburgh, PA, UNITED STATES
       Weiss, Lee E., Pittsburgh, PA, UNITED STATES
PI     US 2003175410       A1  20030918
AI     US 2003-391458      A1  20030318 (10)
PRAI   US 2002-365451P     20020318 (60)
DT     Utility
FS     APPLICATION
LN.CNT 3292
INCL   INCLM: 427/002.240
       INCLS: 435/396.000; 623/023.720; 118/664.000
NCL    NCLM:  427/002.240
       NCLS:  118/664.000; 435/396.000; 623/023.720
IC     [7]
       ICM    A61F002-02
       IPCI   A61F0002-02 [ICM,7]
       IPCR   C12N0005-00 [I,C*]; C12N0005-00 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 39 OF 77  USPATFULL on STN
Full Text
AN     2003:245405  USPATFULL
TI     Bone-implant prosthesis
IN     Wilshaw, Peter Richard, Oxford, UNITED KINGDOM
       Palsgard, Anna Eva Maria, Uppsala, SWEDEN
PI     US 2003171820       A1  20030911
AI     US 2003-332398      A1  20030307 (10)
       WO 2001-GB3189          20010712
PRAI   GB 2000-17148       20000712
DT     Utility
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FS      APPLICATION
LN.CNT 565
INCL    INCLM: 623/023.120
        INCLS: 623/023.550; 623/023.570; 623/901.000
NCL     NCLM:  623/023.120
        NCLS:  623/023.550; 623/023.570; 623/901.000
IC      [7]
        ICM    A61F002-36
        ICS    A61F002-28
        IPCI   A61F0002-36 [ICM,7]; A61F0002-28 [ICS,7]
        IPCR   A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*];
               A61F0002-30 [I,A]; A61F0002-32 [N,C*]; A61F0002-32 [N,A];
               A61F0002-36 [N,C*]; A61F0002-36 [N,A]; A61F0002-40 [N,A];
               A61K0006-02 [I,C*]; A61K0006-027 [I,A]; A61L0027-00 [I,C*];
               A61L0027-30 [I,A]; A61L0027-32 [I,A]; A61L0027-54 [I,A];
               C23C0028-00 [I,C*]; C23C0028-00 [I,A]

L16  ANSWER 40 OF 77  USPATFULL on STN
Full Text
AN      2003:86137  USPATFULL
TI      Osteointegration device and method
IN      Webster, Thomas J., Lafayette, IN, UNITED STATES
        Tepper, Frederick, Sanford, FL, UNITED STATES
PI      US 2003059742       A1  20030327
AI      US 2002-253300      A1  20020924 (10)
PRAI    US 2001-324398P     20010924 (60)
DT      Utility
FS      APPLICATION
LN.CNT 693
INCL    INCLM: 433/201.100
        INCLS: 623/023.510
NCL     NCLM:  433/201.100
        NCLS:  623/023.510
IC      [7]
        ICM    A61C008-00
        ICS    A61F002-28
        IPCI   A61C0008-00 [ICM,7]; A61F0002-28 [ICS,7]
        IPCR   A61C0008-00 [I,C*]; A61C0008-00 [I,A]; A61F0002-00 [N,C*];
               A61F0002-00 [N,A]; A61F0002-30 [N,C*]; A61F0002-30 [N,A];
               A61K0035-12 [N,C*]; A61K0035-12 [N,A]; A61L0027-00 [I,C*];
               A61L0027-30 [I,A]; A61L0027-44 [I,A]; A61L0027-56 [I,A];
               C12N0005-06 [I,C*]; C12N0005-06 [I,A]

L16  ANSWER 41 OF 77  USPATFULL on STN
Full Text
AN      2003:40431  USPATFULL
TI      Compositions and methods for treating nails and adjacent tissues
IN      LaTorre, Guy, Gainesville, FL, United States
        Greenspan, David C., Gainesville, FL, United States
        Greenspan, Alice D., Gainesville, FL, United States
PA      USBiomaterials Corporation, Alachua, FL, United States (U.S.
        corporation)
PI      US 6517863          B1  20030211
AI      US 2000-488202          20000119 (9)
PRAI    US 1999-116595P     19990120 (60)
DT      Utility
FS      GRANTED
LN.CNT 504
INCL    INCLM: 424/447.000
        INCLS: 424/405.000; 424/443.000; 424/445.000; 424/446.000; 424/061.000;
               514/722.400
NCL     NCLM:  424/447.000
        NCLS:  424/061.000; 424/405.000; 424/443.000; 424/445.000; 424/446.000;
               514/772.400
IC      [7]
        ICM    A61L015-16
        ICS    A61F013-00
        IPCI   A61L0015-16 [ICM,7]; A61F0013-00 [ICS,7]
        IPCR   A61K0008-04 [I,C*]; A61K0008-04 [I,A]; A61K0008-19 [I,C*];
               A61K0008-25 [I,A]; A61K0008-30 [I,C*]; A61K0008-41 [I,A];
               A61Q0003-02 [I,C*]; A61Q0003-02 [I,A]
EXF     424/61; 424/405; 424/443; 424/445; 424/446; 424/447; 514/722.4
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CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 42 OF 77 USPATFULL on STN
Full Text
AN 2002:303741 USPATFULL
TI Silver-containing, sol/gel derived bioglass compositions
IN Bellantone, Maria, London, UNITED KINGDOM
Coleman, Nichola J., Kent, UNITED KINGDOM
Hench, Larry L., London, UNITED KINGDOM
PA Imperial College Innovations, London, UNITED KINGDOM (non-U.S. corporation)
PI US 6482444 B1 20021119
AI US 2000-593868 20000614 (9)
PRAI US 1999-139014P 19990614 (60)
DT Utility
FS GRANTED
LN.CNT 1081
INCL INCLM: 424/618.000
NCL NCLM: 424/618.000
IC [7]
ICM A01N059-16
ICS A61K033-38
IPCI A01N0059-16 [ICM,7]; A61K0033-38 [ICS,7]
IPCR A61L0017-00 [I,C*]; A61L0017-00 [I,A]; A61L0027-00 [I,C*]; A61L0027-10 [I,A]; A61L0027-30 [I,A]; A61L0027-54 [I,A]; C03C0003-076 [I,C*]; C03C0003-078 [I,A]; C03C0003-097 [I,A]; C03C0004-00 [I,C*]; C03C0004-00 [I,A]; C03C0008-00 [I,C*]; C03C0008-08 [I,A]; C03C0013-00 [I,C*]; C03C0013-00 [I,A]; C03C0014-00 [I,C*]; C03C0014-00 [I,A]
EXF 424/400; 424/618
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 43 OF 77 USPATFULL on STN
Full Text
AN 2002:221889 USPATFULL
TI Dental/medical compositions comprising degradable polymers and methods of manufacture thereof
IN Jia, Weitao, Wallingford, CT, UNITED STATES
Jin, Shuhua, Wallingford, CT, UNITED STATES
PI US 2002120033 A1 20020829
US 6787584 B2 20040907
AI US 2001-5298 A1 20011205 (10)
RLI Continuation-in-part of Ser. No. US 2000-638206, filed on 11 Aug 2000, PENDING
PRAI US 2000-251408P 20001205 (60)
DT Utility
FS APPLICATION
LN.CNT 865
INCL INCLM: 523/115.000
NCL NCLM: 523/115.000
NCLS: 106/035.000; 433/228.100; 523/116.000; 523/117.000; 524/127.000; 528/354.000
IC [7]
ICM A61F002-00
ICS C08K003-00
IPCI A61F0002-00 [ICM,7]; C08K0003-00 [ICS,7]
IPCI-2 A61K0006-08 [ICM,7]; A61K0006-087 [ICS,7]; A61K0006-02 [ICS,7,C*]; A61C0005-04 [ICS,7]
IPCR A61K0006-00 [I,C*]; A61K0006-00 [I,A]; A61K0006-02 [I,C*]; A61K0006-083 [I,A]; A61L0024-00 [I,C*]; A61L0024-04 [I,A]; A61L0027-00 [I,C*]; A61L0027-44 [I,A]; A61L0027-46 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 44 OF 77 USPATFULL on STN
Full Text
AN 2002:164425 USPATFULL
TI New cosmetic, personal care, cleaning agent, and nutritional supplement compositions and methods of making and using same
IN Lee, Sean, Karlsruhe, GERMANY, FEDERAL REPUBLIC OF
Kessler, Susanna, Ergolding, GERMANY, FEDERAL REPUBLIC OF
Forberich, Oliver, Oberursel, GERMANY, FEDERAL REPUBLIC OF
Buchwar, Claire, Wiesbaden, GERMANY, FEDERAL REPUBLIC OF

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       Greenspan, David C., Grainsville, FL, UNITED STATES
PI     US 2002086039        A1  20020704
AI     US 2001-818466       A1  20010327 (9)
PRAI   US 2000-192261P      20000327 (60)
       US 2000-197162P      20000414 (60)
DT     Utility
FS     APPLICATION
LN.CNT 4825
INCL   INCLM: 424/401.000
       INCLS: 424/063.000; 424/064.000
NCL    NCLM:  424/401.000
       NCLS:  424/063.000; 424/064.000
IC     [7]
       ICM    A61K007-021
       ICS    A61K007-025; A61K007-00
       IPCI   A61K0007-021 [ICM,7]; A61K0007-025 [ICS,7]; A61K0007-00 [ICS,7]
       IPCR   A61K0008-19 [I,C*]; A61K0008-22 [I,A]; A61K0008-25 [I,A];
              A61Q0001-02 [I,C*]; A61Q0001-02 [I,A]; A61Q0001-06 [I,A];
              A61Q0003-00 [I,C*]; A61Q0003-00 [I,A]; A61Q0005-02 [I,C*];
              A61Q0005-02 [I,A]; A61Q0009-02 [I,C*]; A61Q0009-02 [I,A];
              A61Q0011-00 [I,C*]; A61Q0011-00 [I,A]; A61Q0015-00 [I,C*];
              A61Q0015-00 [I,A]; A61Q0017-04 [I,C*]; A61Q0017-04 [I,A];
              A61Q0019-00 [I,C*]; A61Q0019-00 [I,A]; A61Q0019-10 [I,C*];
              A61Q0019-10 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 45 OF 77  USPATFULL on STN
Full Text
AN     2002:143771  USPATFULL
TI     Bioactive, bioabsorbable surgical composite material
IN     Tormala, Pertti, Tampere, FINLAND
       Valimaa, Tero, Tampere, FINLAND
       Niiranen, Henna, Tampere, FINLAND
       Pohjonen, Timo, Tampere, FINLAND
       Rokkanen, Penti, Helsinki, FINLAND
PA     Bionx Implants Oy, Tampere, FINLAND (non-U.S. corporation)
PI     US 6406498           B1  20020618
AI     US 1998-148838           19980904 (9)
DT     Utility
FS     GRANTED
LN.CNT 970
INCL   INCLM: 623/023.750
       INCLS: 623/011.110
NCL    NCLM:  623/023.750
       NCLS:  623/011.110
IC     [7]
       ICM    A61F002-36
       IPCI   A61F0002-36 [ICM,7]
       IPCR   A61L0017-00 [I,C*]; A61L0017-00 [I,A]; A61L0027-00 [I,C*];
              A61L0027-00 [I,A]; A61L0027-44 [I,A]; A61L0031-12 [I,C*];
              A61L0031-12 [I,A]
EXF    606/53; 623/11; 623/11.11; 623/23.75; 623/23.58; 623/23.61; 424/423;
       424/424

L16  ANSWER 46 OF 77  USPATFULL on STN
Full Text
AN     2002:61564  USPATFULL
TI     Osteogenic implants derived from bone
IN     Boyce, Todd M., Aberdeen, NJ, UNITED STATES
       Kaes, David, Toms River, NJ, UNITED STATES
       Scarborough, Nelson L., Ocean, NJ, UNITED STATES
PA     OSTEOTECH, INC. (U.S. corporation)
PI     US 2002035401        A1  20020321
       US 6808585           B2  20041026
AI     US 2001-973597       A1  20011009 (9)
RLI    Division of Ser. No. US 2000-610026, filed on 3 Jul 2000, PENDING
DT     Utility
FS     APPLICATION
LN.CNT 1250
INCL   INCLM: 623/023.510
       INCLS: 264/175.000; 264/211.000; 264/211.110; 264/236.000; 264/320.000;
              264/322.000; 623/023.610
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NCL NCLM: 156/244.110; 623/023.510
NCLS: 156/245.000; 156/296.000; 264/109.000; 435/372.000; 623/023.610; 623/023.630; 264/175.000; 264/211.000; 264/211.110; 264/236.000; 264/320.000; 264/322.000
IC [7]
ICM A61F002-28
ICS B29C047-00; B29C043-02; B29C043-24; B29C043-52
IPCI A61F0002-28 [ICM,7]; B29C0047-00 [ICS,7]; B29C0043-02 [ICS,7]; B29C0043-24 [ICS,7]; B29C0043-52 [ICS,7]
IPCI-2 A61F0002-28 [ICM,7]
IPCR A61L0027-00 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61L0027-00 [I,C*]; A61L0027-36 [I,A]

L16 ANSWER 47 OF 77 USPATFULL on STN
Full Text
AN 2001:165452 USPATFULL
TI Compositions and methods for repair of osseous defects and accelerated wound healing
IN Yang, Shih-Liang S., Laguna Hills, CA, United States
PA Unicare Biomedical, Inc., Laguna Hills, CA (U.S. corporation)
PI US 2001024662 A1 20010927
US 6482427 B2 20021119
AI US 2001-814481 A1 20010315 (9)
RLI Continuation-in-part of Ser. No. US 1999-298683, filed on 23 Apr 1999, GRANTED, Pat. No. US 6228386
DT Utility
FS APPLICATION
LN.CNT 984
INCL INCLM: 424/489.000
INCLS: 424/618.000
NCL NCLM: 424/426.000; 424/489.000
NCLS: 523/114.000; 523/115.000; 424/618.000
IC [7]
ICM A61K009-14
ICS A61K033-38
IPCI A61K0009-14 [ICM,7]; A61K0033-38 [ICS,7]
IPCI-2 A61F0002-28 [ICM,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-28 [N,A]; A61F0002-28 [N,C*]; A61L0024-00 [I,C*]; A61L0024-02 [I,A]; A61L0027-00 [I,C*]; A61L0027-10 [I,A]; C03C0003-076 [I,C*]; C03C0003-097 [I,A]; C03C0004-00 [I,A]; C03C0004-00 [I,C*]; C03C0012-00 [I,A]; C03C0012-00 [I,C*]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 48 OF 77 USPATFULL on STN
Full Text
AN 2001:154550 USPATFULL
TI Compositions and methods for intervertebral disc reformation
IN Gan, Jean Chin Chin, Ardmore, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Vresilovic, Edward, Philadelphia, PA, United States
Shapiro, Irving, Philadelphia, PA, United States
PA The Trustees of the University of Pennsylvania (U.S. corporation)
PI US 2001020476 A1 20010913
US 6569442 B2 20030527
AI US 2001-833284 A1 20010412 (9)
RLI Division of Ser. No. US 1999-314511, filed on 19 May 1999, GRANTED, Pat. No. US 6240926 Division of Ser. No. US 1996-694191, filed on 8 Aug 1996, GRANTED, Pat. No. US 5964807
DT Utility
FS APPLICATION
LN.CNT 776
INCL INCLM: 128/898.000
INCLS: 427/002.270; 623/919.000; 424/423.000; 427/002.100; 427/002.240; 623/017.160
NCL NCLM: 424/426.000; 128/898.000
NCLS: 128/898.000; 424/093.700; 424/423.000; 435/176.000; 435/177.000; 435/180.000; 435/325.000; 435/381.000; 435/395.000; 435/397.000; 623/017.160; 427/002.100; 427/002.240; 427/002.270; 623/919.000
IC [7]
ICM A61F002-28
ICS A61B019-00; A61F002-44

IPCI A61F0002-28 [ICM,7]; A61B0019-00 [ICS,7]; A61F0002-44 [ICS,7]
IPCI-2 A61F0002-44 [ICM,7]; A01N0063-02 [ICS,7]; C12N0011-14 [ICS,7];
C12N0011-08 [ICS,7]; C12N0011-00 [ICS,7,C*]; C12N0005-08 [ICS,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A];
A61F0002-02 [N,C*]; A61F0002-30 [N,A]; A61F0002-30 [N,C*];
A61F0002-44 [I,A]; A61F0002-44 [I,C*]; A61L0027-00 [I,C*];
A61L0027-02 [I,A]; A61L0027-18 [I,A]; A61L0027-30 [I,A];
A61L0027-38 [I,A]; A61L0027-44 [I,A]; A61L0027-56 [I,A]

L16 ANSWER 49 OF 77 USPATFULL on STN
Full Text
AN 2001:139311 USPATFULL
TI Relic process for producing resorbable ceramic scaffolds
IN Janas, Victor F., Monroe Township, NJ, United States
TenHuisen, Kevor Shane, Clinton, NJ, United States
PI US 2001016353 A1 20010823
US 6667049 B2 20031223
AI US 2001-819214 A1 20010328 (9)
RLI Division of Ser. No. US 1999-333231, filed on 14 Jun 1999, PENDING
DT Utility
FS APPLICATION
LN.CNT 507
INCL INCLM: 435/395.000
INCLS: 264/610.000
NCL NCLM: 424/423.000; 435/395.000
NCLS: 424/093.700; 435/176.000; 435/283.100; 435/284.100; 435/395.000;
435/399.000; 264/610.000
IC [7]
ICM C12N005-08
ICS C12N005-06; B28B001-00
IPCI C12N0005-08 [ICM,7]; C12N0005-06 [ICS,7]; B28B0001-00 [ICS,7]
IPCI-2 A61F0002-00 [ICM,7]; C12N0011-14 [ICS,7]; C12N0011-00 [ICS,7,C*];
C12N0005-06 [ICS,7]; C12N0005-08 [ICS,7]; C12N0003-00 [ICS,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A];
A61F0002-02 [N,C*]; A61F0002-28 [I,A]; A61F0002-28 [I,C*];
A61F0002-30 [I,A]; A61F0002-30 [I,C*]; A61F0002-44 [N,A];
A61F0002-44 [N,C*]; A61F0002-46 [N,A]; A61F0002-46 [N,C*];
A61L0027-00 [I,C*]; A61L0027-12 [I,A]
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 50 OF 77 USPATFULL on STN
Full Text
AN 2001:81254 USPATFULL
TI Compositions and methods for intervertebral disc reformation
IN Chin Gan, Jean Chin, Ardmore, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Vresilovic, Edward, Philadelphia, PA, United States
Shapiro, Irving, Philadelphia, PA, United States
PA The Trustees of the University of Pennsylvania, Philadelphia, PA, United
States (U.S. corporation)
PI US 6240926 B1 20010605
AI US 1999-314511 19990519 (9)
RLI Division of Ser. No. US 1996-694191, filed on 8 Aug 1996, now patented,
Pat. No. US 5964807
DT Utility
FS Granted
LN.CNT 725
INCL INCLM: 128/898.000
INCLS: 623/017.160
NCL NCLM: 128/898.000
NCLS: 623/017.160
IC [7]
ICM A61B019-00
IPCI A61B0019-00 [ICM,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A];
A61F0002-02 [N,C*]; A61F0002-30 [N,A]; A61F0002-30 [N,C*];
A61F0002-44 [I,A]; A61F0002-44 [I,C*]; A61L0027-00 [I,C*];
A61L0027-02 [I,A]; A61L0027-18 [I,A]; A61L0027-30 [I,A];
A61L0027-38 [I,A]; A61L0027-44 [I,A]; A61L0027-56 [I,A]
EXF 623/11; 623/17.16; 623/17.11; 623/23.51; 623/23.61; 623/23.63;
623/16.11; 128/898

L16 ANSWER 51 OF 77 USPATFULL on STN
Full Text
AN 2001:63291 USPATFULL
TI Conditioning of **bioactive glass** surfaces in protein containing solutions
IN Ducheyne, Paul, Rosemont, PA, United States
Radin, Shulamith, Voorhees, NJ, United States
PA The Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 6224913 B1 20010501
AI US 1997-977093 19971124 (8)
RLI Continuation-in-part of Ser. No. US 1996-647171, filed on 9 May 1996
DT Utility
FS Granted
LN.CNT 868
INCL INCLM: 424/602.000
INCLS: 424/422.000; 424/423.000; 424/426.000; 424/484.000; 424/485.000; 424/486.000; 424/489.000; 424/499.000; 424/603.000; 424/724.000; 424/531.000; 424/549.000; 523/218.000; 523/219.000; 623/908.000; 623/911.000; 623/919.000; 623/923.000
NCL NCLM: 424/602.000
NCLS: 424/422.000; 424/423.000; 424/426.000; 424/484.000; 424/485.000; 424/486.000; 424/489.000; 424/499.000; 424/531.000; 424/549.000; 424/603.000; 424/724.000; 523/218.000; 523/219.000; 623/908.000; 623/911.000; 623/919.000; 623/923.000
IC [7]
ICM A61K033-42
IPCI A61K0033-42 [ICM,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61K0009-50 [I,A]; A61K0009-50 [I,C*]; A61L0027-00 [I,C*]; A61L0027-12 [I,A]; A61L0027-54 [I,A]
EXF 428/403; 428/404; 427/213.31; 427/215; 264/4.3; 264/4.4; 264/4.6; 106/690; 523/218; 523/219; 424/422; 424/423; 424/426; 424/484-486; 424/489; 424/491; 424/499; 424/602; 424/603; 424/724; 424/549; 424/531; 623/908; 623/911; 623/919; 623/923
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 52 OF 77 USPATFULL on STN
Full Text
AN 2001:4660 USPATFULL
TI Bioactive sol-gel compositions and methods
IN Zhong, Jipin, Gainesville, FL, United States
Greenspan, David C., Gainesville, FL, United States
PA USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)
PI US 6171986 B1 20010109
AI US 1998-6337 19980113 (9)
RLI Division of Ser. No. US 1997-834155, filed on 14 Apr 1997, now patented, Pat. No. US 5874101
DT Patent
FS Granted
LN.CNT 518
INCL INCLM: 501/012.000
INCLS: 501/039.000; 501/057.000; 501/058.000; 501/063.000; 106/035.000; 623/016.000
NCL NCLM: 501/012.000
NCLS: 106/035.000; 501/039.000; 501/057.000; 501/058.000; 501/063.000
IC [7]
ICM C03C003-16
ICS C03C003-247
IPCI C03C0003-16 [ICM,7]; C03C0003-247 [ICS,7]; C03C0003-12 [ICS,7,C*]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A]; A61F0002-02 [N,C*]; A61F0002-28 [N,A]; A61F0002-28 [N,C*]; A61F0002-30 [N,A]; A61F0002-30 [N,C*]; A61L0027-00 [I,C*]; A61L0027-10 [I,A]; A61L0027-12 [I,A]; C03B0019-00 [I,C*]; C03B0019-10 [I,A]; C03B0019-12 [I,A]; C03B0019-12 [I,C*]; C03C0001-00 [I,A]; C03C0001-00 [I,C*]; C03C0004-00 [I,A]; C03C0004-00 [I,C*]
EXF 501/39; 501/12; 501/57; 501/58; 501/63; 106/35; 623/16

L16 ANSWER 53 OF 77 USPATFULL on STN
Full Text
AN 2000:174115 USPATFULL
TI Biocompatible compositions and methods of using same

IN Marra, Kacey G., Pittsburg, PA, United States
Weiss, Lee E., Pittsburg, PA, United States
Calvert, Jay Wynn, Pittsburg, PA, United States
Kumta, Prashant N., Pittsburg, PA, United States
PA Carnegie Mellon University, Pittsburgh, PA, United States (U.S. corporation)
University of Pittsburgh, Pittsburgh, PA, United States (U.S. corporation)
PI US 6165486 20001226
AI US 1998-196288 19981119 (9)
DT Utility
FS Granted
LN.CNT 1010
INCL INCLM: 424/423.000
INCLS: 424/422.000; 424/424.000; 424/425.000; 424/428.000
NCL NCLM: 424/423.000
NCLS: 424/422.000; 424/424.000; 424/425.000; 424/428.000
IC [7]
ICM A61F002-00
ICS A61F013-00
IPCI A61F0002-00 [ICM,7]; A61F0013-00 [ICS,7]
IPCR A61L0027-00 [I,C*]; A61L0027-46 [I,A]
EXF 424/423; 424/425; 606/230; 128/90
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 54 OF 77 USPATFULL on STN
Full Text
AN 2000:124949 USPATFULL
TI Composite materials using bone **bioactive glass** and ceramic fibers
IN Marcolongo, Michele S., Lansdowne, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Ko, Frank, Philadephia, PA, United States
LaCourse, William, Alfred, NY, United States
PA The Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 6121172 20000919
AI US 1995-461109 19950605 (8)
RLI Division of Ser. No. US 1995-436585, filed on 8 May 1995, now patented, Pat. No. US 5645934 which is a continuation-in-part of Ser. No. US 1993-152962, filed on 15 Nov 1993, now patented, Pat. No. US 5468544
DT Utility
FS Granted
LN.CNT 910
INCL INCLM: 442/301.000
INCLS: 442/005.000; 442/021.000; 442/043.000; 442/060.000; 428/411.100; 623/011.000; 623/016.000; 501/035.000; 433/201.100; 424/076.800
NCL NCLM: 442/301.000
NCLS: 424/076.800; 428/411.100; 433/201.100; 442/005.000; 442/021.000; 442/043.000; 442/060.000; 501/035.000; 623/022.110; 623/023.610
IC [7]
ICM B32B018-00
ICS C04B033-24
IPCI B32B0018-00 [ICM,7]; C04B0033-24 [ICS,7]; C04B0033-00 [ICS,7,C*]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-30 [I,A]; A61F0002-30 [I,C*]; A61F0002-36 [I,A]; A61F0002-36 [I,C*]; A61L0027-00 [I,C*]; A61L0027-02 [I,A]; A61L0027-10 [I,A]; A61L0027-42 [I,A]; A61L0027-44 [I,A]; C03C0013-00 [I,A]; C03C0013-00 [I,C*]; D03D0015-00 [I,A]; D03D0015-00 [I,C*]
EXF 428/224; 428/247; 428/280; 428/411.1; 623/11; 623/16; 501/35; 433/201.1; 424/76.8; 106/35; 523/114; 524/443; 442/5; 442/21; 442/43; 442/60; 442/301
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 55 OF 77 USPATFULL on STN
Full Text
AN 2000:1556 USPATFULL
TI Bioactive sol-gel compositions and methods
IN Zhong, Jipin, Gainesville, FL, United States
Greenspan, David C., Gainesville, FL, United States
PA USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)
PI US 6010713 20000104
AI US 1998-6630 19980113 (9)

RLI Division of Ser. No. US 1997-834155, filed on 14 Apr 1997, now patented, Pat. No. US 5874101
DT Utility
FS Granted
LN.CNT 515
INCL INCLM: 424/426.000
INCLS: 523/114.000; 523/115.000; 523/116.000; 623/016.000
NCL NCLM: 424/426.000
NCLS: 523/114.000; 523/115.000; 523/116.000; 623/023.480
IC [6]
ICM A61F002-16
ICS A61K006-08
IPCI A61F0002-16 [ICM,6]; A61K0006-08 [ICS,6]; A61K0006-02 [ICS,6,C*]
IPCR A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-02 [N,C*]; A61F0002-02 [N,A]; A61F0002-30 [N,C*]; A61F0002-30 [N,A]; A61L0027-00 [I,C*]; A61L0027-10 [I,A]; A61L0027-12 [I,A]; C03B0019-00 [I,C*]; C03B0019-10 [I,A]; C03B0019-12 [I,C*]; C03B0019-12 [I,A]; C03C0001-00 [I,C*]; C03C0001-00 [I,A]; C03C0004-00 [I,C*]; C03C0004-00 [I,A]
EXF 424/426; 523/114; 523/115; 523/116; 623/16

L16 ANSWER 56 OF 77 USPATFULL on STN
Full Text
AN 2000:569 USPATFULL
TI Process for preparing glass and for conditioning the raw materials intended for this glass preparation
IN Helsen, Jozef A., Zavelstraat 2B, B-3010 Leuven, Belgium
Proost, Joris, Kruisberg 22, B-2400 Mol, Belgium
Brauns, Etienne, Lemmensblok 2, B-2400 Mol, Belgium
PI US 6009724 20000104
WO 9629292 19960926
AI US 1997-913570 19970917 (8)
WO 1996-BE29 19960315
19970917 PCT 371 date
19970917 PCT 102(e) date
PRAI BE 1995-242 19950317
DT Utility
FS Granted
LN.CNT 641
INCL INCLM: 065/017.300
INCLS: 065/391.000; 065/021.100; 065/136.100; 065/144.000
NCL NCLM: 065/017.300
NCLS: 065/021.100; 065/136.100; 065/144.000; 065/391.000
IC [6]
ICM C03B009-00
ICS C03B019-10; C03B023-00; C03B037-00
IPCI C03B0009-00 [ICM,6]; C03B0019-10 [ICS,6]; C03B0019-00 [ICS,6,C*]; C03B0023-00 [ICS,6]; C03B0037-00 [ICS,6]
IPCR C03B0005-00 [I,C*]; C03B0005-02 [I,A]; C03B0019-00 [I,C*]; C03B0019-01 [I,A]; C03B0019-06 [I,C*]; C03B0019-06 [I,A]; C03B0019-10 [I,A]; C03B0032-00 [I,C*]; C03B0032-00 [I,A]; C03C0012-00 [I,C*]; C03C0012-00 [I,A]
EXF 065/391; 065/414; 065/421; 065/436; 065/17.3; 065/21.1; 065/21.3; 065/60.5; 065/60.8; 065/134.1; 065/135.9; 065/136.1; 065/142; 065/144; 501/27; 501/53; 501/55; 501/56; 501/58; 501/61; 501/63
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 57 OF 77 USPATFULL on STN
Full Text
AN 1999:124145 USPATFULL
TI Compositions and methods for intervertebral disc reformation
IN Gan, Jean Chin Chin, Ardmore, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Vresilovic, Edward, Philadelphia, PA, United States
Shapiro, Irving, Philadelphia, PA, United States
PA Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 5964807 19991012
AI US 1996-694191 19960808 (8)
DT Utility
FS Granted

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LN.CNT 733
INCL    INCLM: 623/017.000
        INCLS: 623/011.000; 623/016.000; 427/002.100; 427/002.240
NCL     NCLM:  424/423.000
        NCLS:  427/002.100; 427/002.240; 623/017.160
IC      [6]
        ICM    A61F002-44
        IPCI   A61F0002-44 [ICM,6]
        IPCR   A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-02 [N,C*];
               A61F0002-02 [N,A]; A61F0002-30 [N,C*]; A61F0002-30 [N,A];
               A61F0002-44 [I,C*]; A61F0002-44 [I,A]; A61L0027-00 [I,C*];
               A61L0027-02 [I,A]; A61L0027-18 [I,A]; A61L0027-30 [I,A];
               A61L0027-38 [I,A]; A61L0027-44 [I,A]; A61L0027-56 [I,A]
EXF     623/11; 623/16; 623/17; 623/18; 427/2.1; 427/2.24

L16  ANSWER 58 OF 77  USPATFULL on STN
Full Text
AN      1999:69745  USPATFULL
TI      Bioactive load bearing bone bonding compositions
IN      Erbe, Erik M., Berwyn, PA, United States
PA      Orthovita, Inc., Malvern, PA, United States (U.S. corporation)
PI      US 5914356              19990622
        WO 9720521  19970612
AI      US 1998-77709           19980605 (9)
        WO 1996-US19368         19961206
                                19980605  PCT 371 date
                                19980605  PCT 102(e) date
DT      Utility
FS      Granted
LN.CNT 1801
INCL    INCLM: 523/114.000
        INCLS: 523/113.000; 523/115.000; 524/414.000; 524/456.000; 106/035.000;
               106/634.000; 106/691.000; 501/072.000; 501/073.000; 065/033.100;
               623/016.000D
NCL     NCLM:  523/114.000
        NCLS:  065/033.100; 106/035.000; 106/634.000; 106/691.000; 501/072.000;
               501/073.000; 523/113.000; 523/115.000; 524/414.000; 524/456.000
IC      [6]
        ICM    A61K006-06
        ICS    C08K003-40
        IPCI   A61K0006-06 [ICM,6]; A61K0006-02 [ICM,6,C*]; C08K0003-40 [ICS,6];
               C08K0003-00 [ICS,6,C*]
        IPCR   A61K0006-02 [I,C*]; A61K0006-083 [I,A]; A61L0024-00 [I,C*];
               A61L0024-00 [I,A]; A61L0024-02 [I,A]; C03C0010-00 [I,C*];
               C03C0010-00 [I,A]
EXF     523/113; 523/114; 523/115; 524/414; 524/456; 106/35; 106/634; 106/691;
        501/72; 501/73; 065/33.1; 623/16D
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 59 OF 77  USPATFULL on STN
Full Text
AN      1999:24327  USPATFULL
TI      Bioactive-gel compositions and methods
IN      Zhong, Jipin, Gainesville, FL, United States
        Greenspan, David C., Gainesville, FL, United States
PA      USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)
PI      US 5874101              19990223
AI      US 1997-834155          19970414 (8)
DT      Utility
FS      Granted
LN.CNT 579
INCL    INCLM: 424/426.000
        INCLS: 523/114.000; 523/115.000; 523/116.000
NCL     NCLM:  424/426.000
        NCLS:  523/114.000; 523/115.000; 523/116.000
IC      [6]
        ICM    A61F002-28
        IPCI   A61F0002-28 [ICM,6]
        IPCR   A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-00 [N,C*];
               A61F0002-00 [N,A]; A61F0002-02 [N,C*]; A61F0002-02 [N,A];
               A61F0002-30 [N,C*]; A61F0002-30 [N,A]; A61L0027-00 [I,C*];
               A61L0027-10 [I,A]; A61L0027-12 [I,A]; C03B0019-00 [I,C*];
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C03B0019-10 [I,A]; C03B0019-12 [I,C*]; C03B0019-12 [I,A];
C03C0001-00 [I,C*]; C03C0001-00 [I,A]; C03C0004-00 [I,C*];
C03C0004-00 [I,A]
EXF 523/114; 523/115; 523/116; 424/426

L16 ANSWER 60 OF 77 USPATFULL on STN
Full Text
AN 1998:119071 USPATFULL
TI Colloidal silica films for cell culture
IN Wolcott, Christine C., Horseheads, NY, United States
PA Corning Incorporated, United States (U.S. corporation)
PI US 5814550 19980929
AI US 1996-721152 19960926 (8)
PRAI US 1995-5039P 19951006 (60)
DT Utility
FS Granted
LN.CNT 1125
INCL INCLM: 435/402.000
INCLS: 435/289.100; 435/305.100
NCL NCLM: 435/402.000
NCLS: 435/289.100; 435/305.100
IC [6]
ICM C12M003-04
IPCI C12M0003-04 [ICM,6]
IPCR C12N0005-00 [I,C*]; C12N0005-00 [I,A]; C12N0005-06 [I,C*];
C12N0005-06 [I,A]
EXF 117/76; 117/152; 117/169; 428/403; 435/305.1; 435/325; 435/395; 435/402;
435/284; 435/283.1; 435/289.1

L16 ANSWER 61 OF 77 USPATFULL on STN
Full Text
AN 1998:48308 USPATFULL
TI Hard **tissue** bone cements and substitutes
IN Cooper, Kevin, Warren, NJ, United States
Chen, Chao C., Edison, NJ, United States
Scopelianos, Angelo, Whitehouse Station, NJ, United States
PA Ethicon, Inc., Somerville, NJ, United States (U.S. corporation)
PI US 5747390 19980505
AI US 1996-603570 19960220 (8)
RLI Continuation of Ser. No. US 1995-416383, filed on 6 Apr 1995, now
abandoned which is a division of Ser. No. US 1994-346652, filed on 30
Nov 1994, now abandoned
DT Utility
FS Granted
LN.CNT 818
INCL INCLM: 442/059.000
INCLS: 442/164.000; 442/417.000; 528/354.000; 528/355.000; 528/358.000;
623/016.000; 428/375.000
NCL NCLM: 442/059.000
NCLS: 428/375.000; 442/164.000; 442/417.000; 528/354.000; 528/355.000;
528/358.000
IC [6]
ICM A61F002-28
ICS B32B027-36
IPCI A61F0002-28 [ICM,6]; B32B0027-36 [ICS,6]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61L0024-00 [I,C*];
A61L0024-00 [I,A]; A61L0027-00 [I,C*]; A61L0027-32 [I,A];
C08J0003-20 [I,C*]; C08J0003-20 [I,A]
EXF 442/59; 442/164; 442/417; 528/354; 528/355; 528/358; 623/16; 428/375
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 62 OF 77 USPATFULL on STN
Full Text
AN 1998:19527 USPATFULL
TI Composite materials using bone **bioactive glass** and ceramic fibers
IN Marcolongo, Michele S., Lansdowne, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Ko, Frank, Philadelphia, PA, United States
LaCourse, William, Alfred, NY, United States
PA Trustees of the University of Pennsylvania, Philadelphia, PA, United
States (U.S. corporation)
PI US 5721049 19980224

AI US 1995-463009 19950605 (8)
RLI Division of Ser. No. US 1995-436585, filed on 8 May 1995 which is a continuation-in-part of Ser. No. US 1993-152962, filed on 15 Nov 1993, now patented, Pat. No. US 5468544, issued on 21 Nov 1995
DT Utility
FS Granted
LN.CNT 907
INCL INCLM: 428/370.000
INCLS: 428/300.400; 428/357.000; 428/361.000; 428/373.000; 428/374.000; 428/411.100; 623/011.000; 623/016.000; 501/035.000; 501/055.000; 501/063.000; 501/068.000
NCL NCLM: 428/370.000
NCLS: 424/423.000; 428/300.400; 428/357.000; 428/361.000; 428/373.000; 428/374.000; 428/411.100; 501/035.000; 501/055.000; 501/063.000; 501/068.000
IC [6]
ICM C04B033-24
ICS C03C003-076; B32B017-04
IPCI C04B0033-24 [ICM,6]; C04B0033-00 [ICM,6,C*]; C03C0003-076 [ICS,6]; B32B0017-04 [ICS,6]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*]; A61F0002-30 [I,A]; A61F0002-36 [I,C*]; A61F0002-36 [I,A]; A61L0027-00 [I,C*]; A61L0027-02 [I,A]; A61L0027-10 [I,A]; A61L0027-42 [I,A]; A61L0027-44 [I,A]; C03C0013-00 [I,C*]; C03C0013-00 [I,A]; D03D0015-00 [I,C*]; D03D0015-00 [I,A]
EXF 623/11; 623/16; 501/35; 501/55; 501/63; 501/68; 433/201.1; 424/76.8; 106/35; 523/114; 524/443; 428/224; 428/247; 428/280; 428/411.1; 428/357; 428/361; 428/370; 428/373; 428/324
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 63 OF 77 USPATFULL on STN
Full Text
AN 97:99322 USPATFULL
TI Bioactive load bearing bone graft compositions
IN Erbe, Erik M., Berwyn, PA, United States
PA Orthovita, Inc., Malvern, PA, United States (U.S. corporation)
PI US 5681872 19971028
AI US 1995-568812 19951207 (8)
DT Utility
FS Granted
LN.CNT 1559
INCL INCLM: 523/114.000
INCLS: 523/113.000; 523/115.000; 524/456.000; 524/414.000; 260/998.110; 106/035.000; 106/634.000; 106/691.000; 501/070.000
NCL NCLM: 523/114.000
NCLS: 106/035.000; 106/634.000; 106/691.000; 260/998.110; 501/070.000; 523/113.000; 523/115.000; 524/414.000; 524/456.000
IC [6]
ICM A61K006-06
ICS C08K003-40
IPCI A61K0006-06 [ICM,6]; A61K0006-02 [ICM,6,C*]; C08K0003-40 [ICS,6]; C08K0003-00 [ICS,6,C*]
IPCR A61C0008-00 [I,C*]; A61C0008-00 [I,A]; A61B0017-68 [I,C*]; A61B0017-86 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-30 [N,C*]; A61F0002-30 [N,A]; A61F0002-32 [I,C*]; A61F0002-32 [I,A]; A61F0002-44 [I,C*]; A61F0002-44 [I,A]; A61F0002-46 [I,C*]; A61F0002-46 [I,A]; A61K0006-02 [I,C*]; A61K0006-06 [I,A]; A61K0006-083 [I,A]; A61L0027-00 [I,C*]; A61L0027-02 [I,A]; A61L0027-44 [I,A]; A61L0027-46 [I,A]; A61L0031-00 [I,C*]; A61L0031-00 [I,A]; C03C0010-00 [I,C*]; C03C0010-00 [I,A]; C08K0003-00 [I,C*]; C08K0003-34 [I,A]; C08L0033-00 [I,C*]; C08L0033-10 [I,A]; C08L0101-00 [I,C*]; C08L0101-00 [I,A]
EXF 523/114; 523/115; 523/113; 524/456; 524/414; 260/998.11; 106/35; 106/634; 106/691; 501/70
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 64 OF 77 USPATFULL on STN
Full Text
AN 97:96913 USPATFULL
TI Hard **tissue** bone cements and substitutes
IN Cooper, Kevin, Warren, NJ, United States

Chen, Chao C., Edison, NJ, United States
Scopelianos, Angelo, Whitehouse Station, NJ, United States
PA Ethicon, Inc., Somerville, NJ, United States (U.S. corporation)
PI US 5679723 19971021
AI US 1996-710691 19960919 (8)
RLI Continuation of Ser. No. US 1995-416389, filed on 6 Apr 1995, now abandoned which is a division of Ser. No. US 1994-346652, filed on 30 Nov 1994, now abandoned
DT Utility
FS Granted
LN.CNT 885
INCL INCLM: 523/115.000
INCLS: 424/426.000; 428/245.000; 528/358.000; 623/016.000
NCL NCLM: 523/115.000
NCLS: 424/426.000; 528/358.000
IC [6]
ICM A61F002-02
ICS A61F002-28; C08G063-82
IPCI A61F0002-02 [ICM,6]; A61F0002-28 [ICS,6]; C08G0063-82 [ICS,6]; C08G0063-00 [ICS,6,C*]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61L0024-00 [I,C*]; A61L0024-00 [I,A]; A61L0027-00 [I,C*]; A61L0027-44 [I,A]; A61L0027-46 [I,A]; A61L0027-58 [I,A]; C08J0003-20 [I,C*]; C08J0003-20 [I,A]
EXF 424/426; 428/240; 428/245; 428/254; 428/262; 428/281; 428/289; 428/323; 428/330; 428/480; 528/354; 528/355; 528/358; 623/16; 523/115
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 65 OF 77 USPATFULL on STN
Full Text
AN 97:58999 USPATFULL
TI Composite materials using bone **bioactive glass** and ceramic fibers
IN Marcolongo, Michele S., Lansdowne, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
PA Trustees Of The University Of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 5645934 19970708
AI US 1995-436585 19950508 (8)
RLI Continuation-in-part of Ser. No. US 1993-152962, filed on 15 Nov 1993, now patented, Pat. No. US 5468544
DT Utility
FS Granted
LN.CNT 897
INCL INCLM: 428/357.000
INCLS: 428/392.000; 428/397.000; 623/011.000; 623/016.000; 501/035.000; 433/201.100; 424/076.800; 106/035.000; 523/114.000
NCL NCLM: 428/357.000
NCLS: 106/035.000; 424/076.800; 428/392.000; 428/397.000; 433/201.100; 501/035.000; 523/114.000; 623/023.510
IC [6]
ICM C04B033-24
ICS C04B035-44
IPCI C04B0033-24 [ICM,6]; C04B0033-00 [ICM,6,C*]; C04B0035-44 [ICS,6]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*]; A61F0002-30 [I,A]; A61F0002-36 [I,C*]; A61F0002-36 [I,A]; A61L0027-00 [I,C*]; A61L0027-02 [I,A]; A61L0027-10 [I,A]; A61L0027-42 [I,A]; A61L0027-44 [I,A]; C03C0013-00 [I,C*]; C03C0013-00 [I,A]; D03D0015-00 [I,C*]; D03D0015-00 [I,A]
EXF 428/392; 428/397; 428/357; 623/11; 623/16; 501/35; 433/201.1; 424/76.8; 106/35; 523/114; 524/443
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 66 OF 77 USPATFULL on STN
Full Text
AN 96:77825 USPATFULL
TI Utilization of biocompatible adhesive/sealant materials for securing surgical devices
IN Regula, Donald W., Belle Mead, NJ, United States
Cooper, Kevin, Warren, NJ, United States
Bregen, Michael F., Milford, NJ, United States
Huxel, Shawn T., Lakehurst, NJ, United States
Rosenman, Daniel C., San Mateo, CA, United States

PA Ethicon, Inc., Somerville, NJ, United States (U.S. corporation)
PI US 5550172 19960827
AI US 1995-385015 19950207 (8)
DT Utility
FS Granted
LN.CNT 595
INCL INCLM: 523/118.000
INCLS: 606/076.000; 606/077.000; 528/354.000; 423/305.000; 423/308.000; 423/309.000; 423/311.000
NCL NCLM: 523/118.000
NCLS: 423/305.000; 423/308.000; 423/309.000; 423/311.000; 528/354.000; 606/076.000; 606/077.000
IC [6]
ICM C08K005-10
ICS A61B017-56; A61B017-58; C01B015-16
IPCI C08K0005-10 [ICM,6]; C08K0005-00 [ICM,6,C*]; A61B0017-56 [ICS,6]; A61B0017-58 [ICS,6]; C01B0015-16 [ICS,6]; C01B0015-00 [ICS,6,C*]
IPCR A61L0024-00 [I,A]; A61L0024-00 [I,C*]; A61L0024-02 [I,A]; A61L0024-04 [I,A]; A61L0024-06 [I,A]; A61L0027-00 [I,C*]; A61L0027-00 [I,A]
EXF 523/118; 606/76; 606/77; 528/354; 528/363; 524/436; 423/305; 423/308; 423/309; 423/311
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 67 OF 77 USPATFULL on STN
Full Text
AN 94:106395 USPATFULL
TI Rapid, customized bone prosthesis
IN Fink, David J., Marble Cliff, OH, United States
DiNovo, Salvatore T., Columbus, OH, United States
Ward, Thomas J., Columbus, OH, United States
PA Guild Associates, Inc., Hilliard, OH, United States (U.S. corporation)
PI US 5370692 19941206
AI US 1992-929449 19920814 (7)
DT Utility
FS Granted
LN.CNT 499
INCL INCLM: 623/016.000
INCLS: 623/066.000
NCL NCLM: 128/898.000
NCLS: 264/401.000; 264/494.000; 600/587.000; 623/901.000; 623/914.000; 700/120.000
IC [5]
ICM A61F002-28
IPCI A61F0002-28 [ICM,5]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*]; A61F0002-30 [I,A]; B29C0041-34 [I,C*]; B29C0041-36 [I,A]; B29C0067-00 [I,C*]; B29C0067-00 [I,A]; G05B0019-4097 [I,C*]; G05B0019-4099 [I,A]
EXF 623/16; 623/18; 623/66

L16 ANSWER 68 OF 77 USPATFULL on STN
Full Text
AN 92:102645 USPATFULL
TI Calcium phosphate ceramics for bone **tissue** calcification enhancement
IN Ducheyne, Paul, Bryn Mawr, PA, United States
Cuckler, John, Haverford, PA, United States
Radin, Shulamit, Cherry Hill, NJ, United States
PA Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 5171326 19921215
AI US 1992-840604 19920220 (7)
RLI Continuation of Ser. No. US 1990-601943, filed on 22 Oct 1990 which is a division of Ser. No. US 1989-307326, filed on 6 Feb 1989, now patented, Pat. No. US 4990163, issued on 5 Feb 1991
DT Utility
FS Granted
LN.CNT 896
INCL INCLM: 623/066.000
INCLS: 423/305.000
NCL NCLM: 623/066.100
NCLS: 423/305.000; 623/923.000

IC [5]
ICM A61F002-54
IPCI A61F0002-54 [ICM,5]; A61F0002-50 [ICM,5,C*]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*];
A61F0002-30 [I,A]; A61L0027-00 [I,C*]; A61L0027-32 [I,A]
EXF 623/11; 623/16; 623/66; 423/305; 435/240.1; 435/241; 427/2

L16 ANSWER 69 OF 77 USPATFULL on STN
Full Text
AN 91:10472 USPATFULL
TI Method of depositing calcium phosphate cermamics for bone **tissue** calcification enhancement
IN Ducheyne, Paul, Bryn Mawr, PA, United States
Cuckler, John, Haverford, PA, United States
Radin, Shulamit, Cherry Hill, NJ, United States
PA Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 4990163 19910205
AI US 1989-307326 19890206 (7)
DT Utility
FS Granted
LN.CNT 966
INCL INCLM: 623/066.000
INCLS: 623/016.000; 427/002.000
NCL NCLM: 427/002.240
NCLS: 204/491.000; 427/002.270; 623/023.560; 623/923.000
IC [5]
ICM A61F002-28
IPCI A61F0002-28 [ICM,5]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61F0002-30 [I,C*];
A61F0002-30 [I,A]; A61L0027-00 [I,C*]; A61L0027-32 [I,A]
EXF 623/16; 623/66; 623/901; 427/2; 501/95

L16 ANSWER 70 OF 77 USPATFULL on STN
Full Text
AN 88:64020 USPATFULL
TI Fluoride-containing Bioglass.TM. compositions
IN Hench, Larry L., Gainesville, FL, United States
Spilman, Derek B., Gainesville, FL, United States
Hench, June W., Gainesville, FL, United States
PA University of Florida, Gainesville, FL, United States (U.S. corporation)
PI US 4775646 19881004
AI US 1986-906619 19860910 (6)
RLI Continuation of Ser. No. US 1984-604704, filed on 27 Apr 1984, now abandoned
DT Utility
FS Granted
LN.CNT 558
INCL INCLM: 501/002.000
INCLS: 501/001.000; 501/057.000; 623/016.000; 128/092.000R; 428/432.000
NCL NCLM: 501/002.000
NCLS: 428/432.000; 501/001.000; 501/057.000; 606/076.000; 623/023.610
IC [4]
ICM C03C010-00
IPCI C03C0010-00 [ICM,4]
IPCR A61F0002-00 [N,C*]; A61F0002-00 [N,A]; A61K0006-02 [I,C*];
A61K0006-06 [I,A]; A61L0027-00 [I,C*]; A61L0027-12 [I,A];
A61L0027-32 [I,A]; C03C0003-076 [I,C*]; C03C0003-097 [I,A];
C03C0004-00 [I,C*]; C03C0004-00 [I,A]
EXF 501/2; 501/57; 501/72; 003/1.9; 128/92C; 428/432-434; 623/16
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 71 OF 77 USPATFULL on STN
Full Text
AN 84:14895 USPATFULL
TI Implant of ceramic material
IN van der Zel, Joseph M., Zwaag, Netherlands
de Groot, Klaas, Heemstede, Netherlands
PA Delphi Dental Industries B.V., Le Hoorn, Netherlands (non-U.S. corporation)
PI US 4437191 19840320
AI US 1982-364975 19820402 (6)

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PRAI   NL 1981-1674        19810403
DT     Utility
FS     Granted
LN.CNT 185
INCL   INCLM: 003/001.000
       INCLS: 003/001.900; 128/092.000C; 128/092.000G
NCL    NCLM:  623/023.560
       NCLS:  606/076.000
IC     [3]
       ICM    A61F001-00
       IPCI   A61F0001-00 [ICM,3]
       IPCR   A61C0008-00 [I,C*]; A61C0008-00 [I,A]; A61F0002-00 [N,C*];
              A61F0002-00 [N,A]; A61F0002-02 [I,C*]; A61F0002-02 [I,A];
              A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61F0002-30 [I,C*];
              A61F0002-30 [I,A]; A61K0006-02 [I,C*]; A61K0006-02 [I,A];
              A61L0027-00 [I,C*]; A61L0027-00 [I,A]; B28B0023-02 [I,C*];
              B28B0023-04 [I,A]
EXF    003/1; 003/1.9; 128/92B; 128/92BC; 128/92C; 128/92D; 128/92G

L16  ANSWER 72 OF 77  USPAT2 on STN
Full Text
AN     2002:337866  USPAT2
TI     Glassy-crystalline material with low solubility and process of preparing
       the same
IN     Berger, Georg, Zepernick, GERMANY, FEDERAL REPUBLIC OF
       Ploska, Ute, Berlin, GERMANY, FEDERAL REPUBLIC OF
PA     Bam Bundesanstalt fuer Materialforschung und Prufung, GERMANY, FEDERAL
       REPUBLIC OF (non-U.S. corporation)
PI     US 6767854          B2  20040727
AI     US 2002-170779          20020613 (10)
PRAI   DE 2001-10129844    20010615
       DE 2002-10223102    20020517
DT     Utility
FS     GRANTED
LN.CNT 497
INCL   INCLM: 501/010.000
       INCLS: 501/001.000; 501/032.000; 501/102.000; 501/044.000; 501/046.000;
              065/033.300
NCL    NCLM:  501/010.000; 501/032.000
       NCLS:  065/033.300; 501/001.000; 501/032.000; 501/044.000; 501/046.000;
              501/102.000; 501/003.000
IC     [7]
       ICM    C03C010-02
       ICS    C03C001-00; C03C003-247; C03C010-16
       IPCI   C03C0014-00 [ICM,7]; C03C0010-02 [ICS,7]; C03C0010-16 [ICS,7];
              C03C0010-00 [ICS,7,C*]
       IPCI-2 C03C0010-02 [ICM,7]; C03C0001-00 [ICS,7]; C03C0003-247 [ICS,7];
              C03C0003-12 [ICS,7,C*]; C03C0010-16 [ICS,7]; C03C0010-00
              [ICS,7,C*]
       IPCR   A61L0027-00 [I,C*]; A61L0027-12 [I,A]; A61L0027-32 [I,A];
              C03C0010-00 [I,C*]; C03C0010-02 [I,A]; C03C0010-16 [I,A]
EXF    501/1; 501/10; 501/32; 501/44-46; 501/102; 065/33.3
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16  ANSWER 73 OF 77  USPAT2 on STN
Full Text
AN     2002:221889  USPAT2
TI     Dental/medical compositions comprising degradable polymers and methods
       of manufacture thereof
IN     Jia, Weitao, Wallingford, CT, United States
       Jin, Shuhua, Wallingford, CT, United States
PA     Pentron Corporation, Wallingford, CT, United States (U.S. corporation)
PI     US 6787584          B2  20040907
AI     US 2001-5298            20011205 (10)
RLI    Continuation-in-part of Ser. No. US 2000-368206, filed on 11 Aug 2000
PRAI   US 2000-251408P     20001205 (60)
DT     Utility
FS     GRANTED
LN.CNT 838
INCL   INCLM: 523/115.000
       INCLS: 523/116.000; 523/117.000; 106/035.000; 433/228.100; 525/900.000;
              524/127.000; 528/354.000
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NCL NCLM: 523/115.000
NCLS: 106/035.000; 433/228.100; 523/116.000; 523/117.000; 524/127.000; 528/354.000
IC [7]
ICM A61K006-08
ICS A61K006-087; A61C005-04
IPCI A61F0002-00 [ICM,7]; C08K0003-00 [ICS,7]
IPCI-2 A61K0006-08 [ICM,7]; A61K0006-087 [ICS,7]; A61K0006-02 [ICS,7,C*]; A61C0005-04 [ICS,7]
IPCR A61K0006-00 [I,C*]; A61K0006-00 [I,A]; A61K0006-02 [I,C*]; A61K0006-083 [I,A]; A61L0024-00 [I,C*]; A61L0024-04 [I,A]; A61L0027-00 [I,C*]; A61L0027-44 [I,A]; A61L0027-46 [I,A]
EXF 523/115; 523/116; 523/117; 106/35; 433/228.1; 525/300; 528/354; 524/127
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 74 OF 77 USPAT2 on STN
Full Text
AN 2002:61564 USPAT2
TI Osteogenic implants derived from bone
IN Boyce, Todd M., Aberdeen, NJ, United States
Kaes, David, Toms River, NJ, United States
Scarborough, Nelson L., Ocean, NJ, United States
PA Osteotech, Inc., Eatontown, NJ, United States (U.S. corporation)
PI US 6808585 B2 20041026
AI US 2001-973597 20011009 (9)
RLI Division of Ser. No. US 2000-610026, filed on 3 Jul 2000
DT Utility
FS GRANTED
LN.CNT 1234
INCL INCLM: 156/244.110
INCLS: 156/245.000; 156/296.000; 264/109.000; 623/023.610; 623/023.630; 435/372.000
NCL NCLM: 156/244.110; 623/023.510
NCLS: 156/245.000; 156/296.000; 264/109.000; 435/372.000; 623/023.610; 623/023.630; 264/175.000; 264/211.000; 264/211.110; 264/236.000; 264/320.000; 264/322.000
IC [7]
ICM A61F002-28
IPCI A61F0002-28 [ICM,7]; B29C0047-00 [ICS,7]; B29C0043-02 [ICS,7]; B29C0043-24 [ICS,7]; B29C0043-52 [ICS,7]
IPCI-2 A61F0002-28 [ICM,7]
IPCR A61L0027-00 [I,A]; A61F0002-28 [I,C*]; A61F0002-28 [I,A]; A61L0027-00 [I,C*]; A61L0027-36 [I,A]
EXF 156/244.11; 156/245; 156/296; 623/23.61; 623/23.63; 523/113; 523/115; 435/372; 264/109

L16 ANSWER 75 OF 77 USPAT2 on STN
Full Text
AN 2001:165452 USPAT2
TI Compositions and methods for repair of osseous defects and accelerated wound healing
IN Yang, Shih-Liang S., Laguna Hills, CA, United States
PA Unicare Biomedical, Inc., Laguna Hills, CA, United States (U.S. corporation)
PI US 6482427 B2 20021119
AI US 2001-814481 20010315 (9)
RLI Continuation-in-part of Ser. No. US 1999-298683, filed on 23 Apr 1999, now patented, Pat. No. US 6228386
DT Utility
FS GRANTED
LN.CNT 928
INCL INCLM: 424/426.000
INCLS: 523/114.000; 523/115.000
NCL NCLM: 424/426.000; 424/489.000
NCLS: 523/114.000; 523/115.000; 424/618.000
IC [7]
ICM A61F002-28
IPCI A61K0009-14 [ICM,7]; A61K0033-38 [ICS,7]
IPCI-2 A61F0002-28 [ICM,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-28 [N,A]; A61F0002-28 [N,C*]; A61L0024-00 [I,C*]; A61L0024-02 [I,A]; A61L0027-00 [I,C*]; A61L0027-10 [I,A]; C03C0003-076 [I,C*];

C03C0003-097 [I,A]; C03C0004-00 [I,A]; C03C0004-00 [I,C*];
C03C0012-00 [I,A]; C03C0012-00 [I,C*]
EXF 424/426; 523/114; 523/115; 623/16
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L16 ANSWER 76 OF 77 USPAT2 on STN
Full Text
AN 2001:154550 USPAT2
TI Preparation of polymer foam having gelled sol coating for intervertebral disc reformation
IN Gan, Jean Chin Chin, Ardmore, PA, United States
Ducheyne, Paul, Rosemont, PA, United States
Vresilovic, Edward, Philadelphia, PA, United States
Shapiro, Irving, Philadelphia, PA, United States
PA The Trustees of the University of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)
PI US 6569442 B2 20030527
AI US 2001-833284 20010412 (9)
RLI Division of Ser. No. US 1999-314511, filed on 19 May 1999, now patented, Pat. No. US 6240926 Division of Ser. No. US 1996-694191, filed on 8 Aug 1996, now patented, Pat. No. US 5964807
DT Utility
FS GRANTED
LN.CNT 742
INCL INCLM: 424/426.000
INCLS: 128/898.000; 424/423.000; 424/093.700; 435/176.000; 435/177.000; 435/180.000; 435/325.000; 435/381.000; 435/395.000; 435/397.000; 623/017.160
NCL NCLM: 424/426.000; 128/898.000
NCLS: 128/898.000; 424/093.700; 424/423.000; 435/176.000; 435/177.000; 435/180.000; 435/325.000; 435/381.000; 435/395.000; 435/397.000; 623/017.160; 427/002.100; 427/002.240; 427/002.270; 623/919.000
IC [7]
ICM A61F002-44
ICS A01N063-02; C12N011-14; C12N011-08; C12N005-08
IPCI A61F0002-28 [ICM,7]; A61B0019-00 [ICS,7]; A61F0002-44 [ICS,7]
IPCI-2 A61F0002-44 [ICM,7]; A01N0063-02 [ICS,7]; C12N0011-14 [ICS,7]; C12N0011-08 [ICS,7]; C12N0011-00 [ICS,7,C*]; C12N0005-08 [ICS,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A]; A61F0002-02 [N,C*]; A61F0002-30 [N,A]; A61F0002-30 [N,C*]; A61F0002-44 [I,A]; A61F0002-44 [I,C*]; A61L0027-00 [I,C*]; A61L0027-02 [I,A]; A61L0027-18 [I,A]; A61L0027-30 [I,A]; A61L0027-38 [I,A]; A61L0027-44 [I,A]; A61L0027-56 [I,A]
EXF 435/174; 435/176; 435/177; 435/180; 435/325; 435/378; 435/381; 435/395; 435/397; 424/93.7; 424/423; 424/426; 128/898; 623/17.16

L16 ANSWER 77 OF 77 USPAT2 on STN
Full Text
AN 2001:139311 USPAT2
TI Relic process for producing bioresorbable ceramic **tissue** scaffolds
IN Janas, Victor F., Monroe Township, NJ, United States
TenHuisen, Kevor Shane, Clinton, NJ, United States
PA Ethicon, Inc., Somerville, NJ, United States (U.S. corporation)
PI US 6667049 B2 20031223
AI US 2001-819214 20010328 (9)
RLI Division of Ser. No. US 1999-333231, filed on 14 Jun 1999
DT Utility
FS GRANTED
LN.CNT 499
INCL INCLM: 424/423.000
INCLS: 424/093.700; 435/176.000; 435/395.000; 435/399.000; 435/283.100; 435/284.100
NCL NCLM: 424/423.000; 435/395.000
NCLS: 424/093.700; 435/176.000; 435/283.100; 435/284.100; 435/395.000; 435/399.000; 264/610.000
IC [7]
ICM A61F002-00
ICS C12N011-14; C12N005-06; C12N005-08; C12N003-00
IPCI C12N0005-08 [ICM,7]; C12N0005-06 [ICS,7]; B28B0001-00 [ICS,7]
IPCI-2 A61F0002-00 [ICM,7]; C12N0011-14 [ICS,7]; C12N0011-00 [ICS,7,C*]; C12N0005-06 [ICS,7]; C12N0005-08 [ICS,7]; C12N0003-00 [ICS,7]
IPCR A61F0002-00 [N,A]; A61F0002-00 [N,C*]; A61F0002-02 [N,A];

A61F0002-02 [N,C*]; A61F0002-28 [I,A]; A61F0002-28 [I,C*];
A61F0002-30 [I,A]; A61F0002-30 [I,C*]; A61F0002-44 [N,A];
A61F0002-44 [N,C*]; A61F0002-46 [N,A]; A61F0002-46 [N,C*];
A61L0027-00 [I,C*]; A61L0027-12 [I,A]
EXF 435/176; 435/180; 435/395; 435/399; 435/283.1; 435/284.1; 424/423; 424/93.7
CAS INDEXING IS AVAILABLE FOR THIS PATENT.

=> d l16 an ti in pa pi ab kwic 55 59 65

L16 ANSWER 55 OF 77 USPATFULL on STN
Full Text
AN 2000:1556 USPATFULL
TI Bioactive sol-gel compositions and methods
IN Zhong, Jipin, Gainesville, FL, United States
Greenspan, David C., Gainesville, FL, United States
PA USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)
PI US 6010713 20000104
AB A process for making bioactive glasses is described including preparing a reaction mixture of reactants capable of forming a sol-gel, aging the reaction mixture, near equilibrium drying a gel resulting from the reaction mixture, and heating the near equilibrium-dried gel described. Also described are near equilibrium-dried **bioactive glass** compositions.
AB . . . drying a gel resulting from the reaction mixture, and heating the near equilibrium-dried gel described. Also described are near equilibrium-dried **bioactive glass** compositions.
SUMM The present invention relates to **bioactive glass** compositions, for example, used for filling bone defects, and bioactive compositions produced by a sol-gel process. The present invention also. . .
SUMM Sol-gel processes for making **bioactive glass** using sol-gel technology are generally known. For example, U.S. Pat. No. 5,074,916 (the "'916 patent"), the subject matter of which is incorporated herein by reference, discloses sol-gel processing techniques used to produce alkali-free **bioactive glass** compositions based on SiO_2, CaO and P_2O_5. The '916 patent discloses that by varying the SiO_2 content, a range. . .
SUMM . . . during drying. U.S. Pat. No. 4,849,378 ("the 378 patent"), incorporated herein by reference discloses a method of fabricating an ultraporous **silicon dioxide** containing gel monolith having a predetermined mean pore size by controlling temperature, duration and other conditions of aging. The '378. . .
SUMM . . . and the pore texture of the monolith was not mentioned. Moreover, this patent does not address the preparation of a **bioactive glass**.
SUMM . . . yield bioactive glasses used for bone grafting and filling osseous defects, having larger pore size at a given level of **silicon dioxide** in the final composition, faster HCA formation, better resorbability, and better homogeneity. It is further an object of the present. . .
SUMM . . . gel resulting from the reaction mixture, and heating the near equilibrium-dried gel. The present invention is also directed to dried **bioactive glass** compositions and monolithic bioactive compositions having improved resorbability. The present invention is further directed to materials suitable for bone grafting, repairing of **tissue** defects and other orthopedic uses.
DRWD FIG. 10 FTIR spectra of various sol-gel **bioactive glass** compositions. All have formed extensive HCA layers.
DRWD FIG. 11(A) FTIR spectra of sol-gel **bioactive glass** prepared by previous method A.
DRWD FIG. 11(B) FTIR spectra of sol-gel **bioactive glass** made in accordance with the present invention including a near equilibrium drying step. As seen in the spectra, more rapid. . .
DRWD FIG. 12 FTIR spectra of sol-gel **bioactive glass** monolith after 24 hours in SBF using near equilibrium drying.
DETD . . . drying step which provides for increased pore size and bioactivity in the final product. The present invention also includes sol-gel **bioactive glass** compositions. The present invention further relates to materials suitable for bone grafting and repairing of **tissue** defects where the rate of resorption can be precisely controlled.
DETD As referred to herein, bioactive glasses are typically **silicon dioxide** based compositions capable of forming HCA when exposed to

physiological fluids. Typically, bioactive glasses have the following composition by weight. . .

DETD . . . the conditions near the two phase boundaries in the phase diagram at a temperature and pressure sufficient to yield a **bioactive glass** with large pore structure i.e. a pore structure sufficient to yield a **bioactive glass**. For example, near equilibrium drying may be drying under the conditions near the line in the phase diagram of water as shown in FIG. 17 (or other liquids such as methanol, ethanol, acetone, liquid CO_2, benzene and so on). By manipulating the sealing of the designed drying chamber to adjust the extent of the drying. . . of near-equilibrium drying, and the temperature at which the drying is conducted, one can drastically alter pore size of resultant **bioactive glass**. For example, increasing the sealing of the drying chamber during drying typically results in an increase in relative humidity and. . .

DETD . . . drying, and the temperature at which near equilibrium drying is conducted, one can drastically alter pore size of the resultant **bioactive glass**. For example, increasing the level of humidity during drying typically results in an increase in pore diameter. Near equilibrium drying. . .

DETD . . . in accordance with the present invention is any process that includes the use of a sol-gel in the preparation of **bioactive glass**. For example, a reaction mixture including tetraethoxysilane (TEOS), triethylphosphate (TEP), and calcium nitrate can be used to make sol-gel bioactive. . .

DETD . . . yields larger pore size in the final product and permits development of HCA very rapidly for both high and low **silicon dioxide** content gels. Indeed, compositions in accordance with the present invention form HCA more rapidly than prior gels when exposed to. . . homogeneity and physical structure. For example, previous sol-gel compositions were not able to provide adequate resorbability at higher levels of **silicon dioxide**. Surprisingly, the present invention provides for excellent resorbability even when high amounts of **silicon dioxide** are included. The sol-gel glasses of the present invention are also more homogeneous than prior sol-gel glasses and calcium is. . .

DETD The process of the present invention also provides for **bioactive glass** capable of resorbing more quickly than known sol-gel **bioactive glass** materials. For example, in-vivo testing of one embodiment of the present invention showed that more than 50% of sol-gel material. . . same extent, have not resorbed at all by eight weeks. Indeed, the '916 patent indicates glasses including more than 55% **silicon dioxide** are not bioactive. Moreover, **bioactive glass** made by the process of the present invention also exhibits substantially no unwanted inflammatory response.

DETD The preparation of sol-gel **bioactive glass** frit was accomplished as follows:

DETD . . . more dramatic results can be seen in FIGS. 4 and 5 which show extensive resorption in 60% by weight silica **bioactive glass** compositions after only 4 weeks in in vivo and very advanced resorption after only 8 weeks. This animal model included. . .

DETD 0.2 g of sol-gel **bioactive glass** particles of samples 77S(A) [no near equilibrium drying] and 77S(B) [equilibrium dried] were tested in 200 ml of SBF in. . .

CLM What is claimed is:

. . . method for treating orthopedic defects comprising contacting an orthopedic defect with a defect healing amount of near equilibrium dried sol-gel **bioactive glass**.

L16 ANSWER 59 OF 77 USPATFULL on STN

Full Text

AN 1999:24327 USPATFULL

TI Bioactive-gel compositions and methods

IN Zhong, Jipin, Gainesville, FL, United States
Greenspan, David C., Gainesville, FL, United States

PA USBiomaterials Corp., Alachua, FL, United States (U.S. corporation)

PI US 5874101 19990223

AB A process for making bioactive glasses is described including preparing a reaction mixture of reactants capable of forming a sol-gel, aging the reaction mixture, near equilibrium drying a gel resulting from the reaction mixture, and heating the -near equilibrium-dried gel described. Also described are near equilibrium-dried **bioactive glass** compositions.

AB . . . drying a gel resulting from the reaction mixture, and heating the -near equilibrium-dried gel described. Also described are near equilibrium-dried **bioactive glass** compositions.

SUMM The present invention relates to **bioactive glass** compositions, for example, used for filling bone defects, and bioactive compositions produced by a sol-gel process. The present invention also. . .

SUMM Sol-gel processes for making **bioactive glass** using sol-gel technology are generally known. For example, U.S. Pat. No. 5,074,916 (the "'916 patent"), the subject matter of which is incorporated herein by reference, discloses sol-gel processing techniques used to produce alkali-free **bioactive glass** compositions based on SiO_2, CaO and P_2O_5. The '916 patent discloses that by varying the SiO_2 content, a range. . .

SUMM . . . during drying. U.S. Pat. No. 4,849,378 ("the 378 patent"), incorporated herein by reference discloses a method of fabricating an ultraporous **silicon dioxide** containing gel monolith having a predetermined mean pore size by controlling temperature, duration and other conditions of aging. The '378. . .

SUMM . . . and the pore texture of the monolith was not mentioned. Moreover, this patent does not address the preparation of a **bioactive glass**.

SUMM . . . yield bioactive glasses used for bone grafting and filling osseous defects, having larger pore size at a given level of **silicon dioxide** in the final composition, faster HCA formation, better resorbability, and better homogeneity. It is further an object of the present. . .

SUMM . . . gel resulting from the reaction mixture, and heating the near equilibrium-dried gel. The present invention is also directed to dried **bioactive glass** compositions and monolithic bioactive compositions having improved resorbability. The present invention is further directed to materials suitable for bone grafting, repairing of **tissue** defects and other orthopedic uses.

DRWD FIG. 10 FTIR spectra of various sol-gel **bioactive glass** compositions. All have formed extensive HCA layers.

DRWD FIG. 11(A) FTIR spectra of sol-gel **bioactive glass** prepared by previous method A.

DRWD FIG. 11(B) FTIR spectra of sol-gel **bioactive glass** made in accordance with the present invention including a near equilibrium drying step. As seen in the spectra, more rapid. . .

DRWD FIG. 12 FTIR spectra of sol-gel **bioactive glass** monolith after 24 hours in SBF using near equilibrium drying.

DETD . . . drying step which provides for increased pore size and bioactivity in the final product. The present invention also includes sol-gel **bioactive glass** compositions. The present invention further relates to materials suitable for bone grafting and repairing of **tissue** defects where the rate of resorption can be precisely controlled.

DETD As referred to herein, bioactive glasses are typically **silicon dioxide** based compositions capable of forming HCA when exposed to physiological fluids. Typically, bioactive glasses have the following composition by weight. . .

DETD . . . the conditions near the two phase boundaries in the phase diagram at a temperature and pressure sufficient to yield a **bioactive glass** with large pore structure i.e. a pore structure sufficient to yield a **bioactive glass**. For example, near equilibrium drying may be drying under the conditions near the line in the phase diagram of water as shown in FIG. 17 (or other liquids such as methanol, ethanol, acetone, liquid CO_2, benzene and so on). By manipulating the sealing of the designed drying chamber to adjust the extent of the drying. . . of near-equilibrium drying, and the temperature at which the drying is conducted, one can drastically alter pore size of resultant **bioactive glass**. For example, increasing the sealing of the drying chamber during drying typically results in an increase in relative humidity and. . .

DETD . . . drying, and the temperature at which near equilibrium drying is conducted, one can drastically alter pore size of the resultant **bioactive glass**. For example, increasing the level of humidity during drying typically results in an increase in pore diameter. Near equilibrium drying. . .

DETD . . . in accordance with the present invention is any process that includes the use of a sol-gel in the preparation of **bioactive glass**. For example, a reaction mixture including tetraethoxysilane (TEOS), triethylphosphate (TEP), and calcium nitrate can be used to make sol-gel

bioactive. . .

DETD . . . yields larger pore size in the final product and permits development of HCA very rapidly for both high and low **silicon dioxide** content gels. Indeed, compositions in accordance with the present invention form HCA more rapidly than prior gels when exposed to. . . homogeneity and physical structure. For example, previous sol-gel compositions were not able to provide adequate resorbability at higher levels of **silicon dioxide**. Surprisingly, the present invention provides for excellent resorbability even when high amounts of **silicon dioxide** are included. The sol-gel glasses of the present invention are also more homogeneous than prior sol-gel glasses and calcium is. . .

DETD The process of the present invention also provides for **bioactive glass** capable of resorbing more quickly than known sol-gel **bioactive glass** materials. For example, in-vivo testing of one embodiment of the present invention showed that more than 50% of sol-gel material. . . same extent, have not resorbed at all by eight weeks. Indeed, the '916 patent indicates glasses including more than 55% **silicon dioxide** are not bioactive. Moreover, **bioactive glass** made by the process of the present invention also exhibits substantially no unwanted inflammatory response.

DETD The preparation of sol-gel **bioactive glass** frit was accomplished as follows:

DETD . . . more dramatic results can be seen in FIGS. 4 and 5 which show extensive resorption in 60% by weight silica **bioactive glass** compositions after only 4 weeks in in vivo and very advanced resorption after only 8 weeks. This animal model included. . .

DETD Other resorbability testing was also conducted on the foregoing comparative sol-gels. 0.2 g of sol-gel **bioactive glass** particles of samples 77S(A) [no near equilibrium drying] and 77S(B) [equilibrium dried] were tested in 200 ml of SBF in. . .

CLM What is claimed is:

18. A sol-gel process for making a **bioactive glass** monolith comprising: preparing a reaction mixture capable of forming a bioactive sol-gel monolith; casting the reaction mixture into a mold. . .

27. The composition of claim 23, wherein said glass further comprises at least 77% **silicon dioxide**.

L16 ANSWER 65 OF 77 USPATFULL on STN

Full Text

AN 97:58999 USPATFULL

TI Composite materials using bone **bioactive glass** and ceramic fibers

IN Marcolongo, Michele S., Lansdowne, PA, United States
Ducheyne, Paul, Rosemont, PA, United States

PA Trustees Of The University Of Pennsylvania, Philadelphia, PA, United States (U.S. corporation)

PI US 5645934 19970708

AB Composite materials formed from bone **bioactive glass** or ceramic fibers and structural fibers are disclosed. In preferred embodiments, a braid or mesh of interwoven bone **bioactive glass** or ceramic fibers and structural fibers is impregnated with a polymeric material to provide a composite of suitable biocompatibility and structural integrity. Most preferably, the mesh or braid is designed so that the bioactive fibers are concentrated at the surface of the implant to create a surface comprised of at least 30% bioactive material, thereby providing enhanced bone ingrowth. The interweaving between the bone **bioactive glass** or ceramic fibers and the core of structural fibers overcomes the problems found in prior composite systems where the bioactive material delaminates from the polymer. Preferred bioactive materials include calcium phosphate ceramics and preferred structural fibers include carbon fibers. Further preferred bioactive materials include **aluminum oxide** at greater than 0.2%, by mole. Improved prosthetic implants and methods of affixing an implant are thus also disclosed.

TI Composite materials using bone **bioactive glass** and ceramic fibers

AB Composite materials formed from bone **bioactive glass** or ceramic fibers and structural fibers are disclosed. In preferred embodiments, a braid or mesh of interwoven bone **bioactive glass** or ceramic fibers and structural fibers is impregnated with a polymeric material to provide a composite of suitable biocompatibility and. . . create a surface comprised of at least 30% bioactive material, thereby providing enhanced bone ingrowth. The interweaving between the bone **bioactive**

glass or ceramic fibers and the core of structural fibers overcomes the problems found in prior composite systems where the bioactive. . . polymer. Preferred bioactive materials include calcium phosphate ceramics and preferred structural fibers include carbon fibers. Further preferred bioactive materials include **aluminum oxide** at greater than 0.2%, by mole. Improved prosthetic implants and methods of affixing an implant are thus also disclosed.

SUMM The present invention relates to composites made from fibers comprised of **bioactive glass** and the use of such composites to form implantable surfaces. In particular, the present invention relates to composites comprised of bone **bioactive glass** or ceramic fibers intermingled with structural fibers such as carbon fibers in a matrix of a polymeric material.

SUMM . . . have been employed as femoral components of hip implants to reduce stress shielding of the bone and consequently reduce bone **tissue** resorption. Currently, composite implants are stabilized in their bony bed by a press fit. With this method of stabilization, however,. . .

SUMM . . . bioactive coatings. Implants using porous polymer coatings seek to achieve fixation through mechanical interlocking between the implant and surrounding bone **tissue**, while the bioactive coatings are designed to attain fixation through a chemical bond between the implant and bone.

SUMM . . . Clin. Ortho. Rel. Res., 235:207-218 (1988). Although it is disclosed that some bone growth was evident, the majority of the **tissue** about the implant surface was fibrous. The porous polymer did not enhance the bone **tissue** growth in any way.

SUMM . . . Pat. No. 4,202,055--Reiner et al. The ceramic particles at the surface of this implant resorb and are replaced by bone **tissue**. There are no structural fibers and the polymer alone is intended to bear the load. This limits the load-bearing applications. . . implantation. The calcium phosphate particles are added for strength and also resorb, therefore this device is not fixed to bone **tissue** through the chemical bonding of bioactive material or porous ingrowth.

SUMM . . . mineral fibers less than 20 millimeters long. This device is used as a grouting material to bond implants to bone **tissue**. The chopped fibers are not specifically tailored or designed for mechanical property optimization. A similar composition is disclosed in U.S.. . .

SUMM Much of the prior art discussed immediately above utilized calcium phosphate ceramic powders as the bioactive component of the composite. **Bioactive glass** materials were developed by Hench in 1969. See L. Hench, et al., "Bonding Mechanisms at the Interface of Ceramic Prosthetic Materials," J. Biomed. Mater. Res., 2:117-141 (1971). More recently, elongated, continuous **bioactive glass** fibers have been fabricated. See U. Pazzaglia, et al., "Study of the Osteoconductive Properties of **Bioactive Glass** Fibers," J. Biomed. Mater. Res., 23:1289-1297 (1989); and H. Tagai, et al., "Preparation of Apatite Glass Fiber for Application as Biomaterials," Ceramics in Surgery, Vincenzini, P. (Ed.), Amsterdam, Elsevier Sci. Pub. **Co**. (1983), p. 387-393. The latter reference discloses **bioactive glass** fibers in resorbable bone plates.

SUMM It has now been found that bone **bioactive glass** or ceramic fibers are useful as a chemical bonding vehicle in combination with a structural three-dimensional braided fiber substrate. The bioactive fibers enhance bone growth and bond to surrounding bone **tissue**. These bone **bioactive glass** or ceramic fibers are interwoven in the three dimensional braid with carbon fibers and infiltrated with a thermoplastic polymer to. . .

DRWD FIG. 1 is an illustration of the apparatus used to draw bone **bioactive glass** or ceramic fibers used in the present invention.

DRWD FIG. 5 is a schematic illustrating the orientation and placement of fibers in a textile woven from bone **bioactive glass** or ceramic fibers and structural fibers in accordance with the present invention.

DETD . . . interface of the structural substrate and the carbon fiber/polymer interface, and to the interface between the bioactive surface and the **bioactive glass** fiber/polymer interface. As explained below, the bioactive section of the implant material is integrally incorporated into the substrate through a. . .

DETD In the local environment of the **bioactive glass** fiber, a partial degradation occurs. As the **bioactive glass** fiber is resorbed it is replaced by bone **tissue**; the bone **tissue** is chemically bonded to the glass fiber and also interlocked with these fibers. Furthermore, the bioactivity reactions occurring at the glass surface lead to a

precipitation layer on the polymer. This layer, in turn, promotes bone **tissue** formation and bonding. The triple means of interfacial bonding leads to an interface which stabilizes the implant in its bony bed and provides stress transfer from the implant across the bonded interface into bone **tissue**. The bone is stressed, thus limiting bone **tissue** resorption due to stress shielding. This significant occurrence will increase the life of an implant because fixation and stability will not be lost due to bone **tissue** resorption, which is an initiator in the cascade of events leading to prosthesis loosening.

DETD In the present invention, a composition of bone **bioactive glass** or ceramic fibers is preferred. In the case of glass the preferred composition leads to a slowly reacting glass while. . . a large surface area of glass is exposed to physiological solutions during implantation with glass in a fibrous configuration. A **bioactive glass** that quickly degrades may lead to an adverse inflammatory response, impeding bone growth and bonding. The tradeoff is that since. . . too fluid, or the fibers would break upon drawing. Describing the compositional range for materials capable of being drawn into **bioactive glass** or ceramic fibers thus involves bioactivity versus manufacturability. A most preferred composition that can be successfully drawn into fibers while. . .

DETD The following Examples will discuss and explain the formation of a continuous fiber of a **bioactive glass** for use in a braided fiber and a woven fabric, both of which are impregnated with a polymeric material such. . .

DETD One **bioactive glass** fiber/polysulfone and one control polysulfone plug were implanted bilaterally in the medial proximal aspect of the tibia using aseptic techniques.. . .

DETD . . . 400×. The composite material shows very close apposition to bone in areas of high fiber concentration. In these areas, bone **bioactive glass** or ceramic fibers are partially resorbed, more clearly seen in FIG. 3, taken at 1000×. In addition, in regions where. . . apposition is achieved, there is also bone apposition to the adjacent polysulfone matrix. In contrast, the polysulfone implants show bone **tissue** surrounding the plug, but with an interposing layer between the implant and bone **tissue**.

DETD Thus, the foregoing Example shows that the **bioactive glass** fiber/polysulfone plugs made in accordance with the present invention achieve a bond between surrounding bone **tissue** and the glass fibers at the implant surface. The bonded fibers are partially resorbed with bone **tissue** replacing the glass. Consequently, the method of glass fiber fixation to bone is not only by chemical bonding, but also by micromechanical interlocking. Additionally, there appears to be a bond between the adjacent polymer and surrounding bone **tissue**. This would lead to increased areas of fixation between the composite and bone beyond that of the fiber itself.

DETD . . . is formed, the polymer itself may act as a substrate for bone growth. Similar findings after implantation of a titanium fiber/**bioactive glass** composite in dogs were recently reported. Van Hove et al., Bioceramics, Vol. 6, P. Ducheyne and D. Christiansen, eds., pp. 319-325, Butterworth-Heinemann, Oxford (1993). This study shows bone growth over a titanium fiber which was between two islands of **bioactive glass**. If the separation between the glass was less than 50 microns, the titanium was covered with bone, but if it. . . coverage. An in vitro study has concluded that when a polymer is faced 1 mm or less away from a **bioactive glass** in simulated body fluid, a calcium phosphate layer is precipitated onto the polymer surface. See T. Kokubo, et al, "International. . .

DETD The histological observations of the foregoing Example indicate that bone **bioactive glass** or ceramic fibers in combination with polysulfone polymer will bond to bone **tissue**. This finding indicates that bone **bioactive glass** or ceramic fibers on the surface region of low modulus composite implants, such as hip stems and bone plates will. . .

DETD . . . composites with a bioactive powder dispersed through the polymer matrix. It has been determined having surface area partially covered by **bioactive glass** in a composite form leads to bone bonding in vivo. A calcium phosphate layer is the substrate for bone growth.. . . of a calcium phosphate layer on a non-bioactive material is possible if the material is in close apposition to the **bioactive glass**. Consequently, it has been found that a composite with only a partial bioactive surface would still achieve bonding. Preferably, the. . .

DETD . . . impregnating the braid with a filler material, such as a polymer. In preferred embodiments of the present invention, continuous bone **bioactive glass** or ceramic fibers are grouped into 5000 filament fiber bundles. The fiber bundles (or "tow") are interwoven with carbon fibers into a braided textile preform. Most preferably, the bone **bioactive glass** or ceramic fibers are made in accordance with the composition formulation set forth above. As seen in FIG. 4, a. . .

DETD . . . polymer fibers so as to achieve uniform polymer distribution throughout the fibrous preform. The final composite is machined to expose **bioactive glass** 100 fibers at the surface.

DETD . . . a carbon fiber, three dimensional structural reinforcement network. This results in a delamination resistant, interpenetrating fibrous network which allows bone **tissue** ingrowth.

DETD To facilitate composite processing, a thermoplastic matrix in filamentous form is **co**-mingled with the reinforcement fibers. As a result, the thermoplastic fibers are uniformly distributed through out the structure. A composite can. . .

DETD In FIG. 5, the X's represent the bone **bioactive glass** or ceramic fibers, the number and distribution of which can vary, and the O's are a structural fiber, preferably carbon. . .

DETD In a preferred embodiment, the integration of the bone **bioactive glass** or ceramic fibers into the carbon fiber in an interfacial region is accommodate by the position of the carrier in. . .

DETD Thus, it will be appreciated that the present invention is very versatile in many of its parameters. The bone **bioactive glass** or ceramic fiber can be selected from **bioactive glass** or glass-ceramic materials, including calcium phosphate ceramic fibers. The polymer system used may be any polymer which bonds to the bone **bioactive glass** or ceramic fibers, is biocompatible, and does not inhibit the bioactivity of the fibers in vivo. Examples of such polymer. . . In accordance with the present invention fibrous composites of biocompatible materials can be made into bioactive composites by incorporating bone **bioactive glass** or ceramic fibers into the weave at the bone contact surface.

DETD Classification of the in vitro reaction stages of the **bioactive glass** fibers according to the Hench system puts stages 1-3 in the first eight hours to 1 day. Stage 4 corresponds to 3 days immersion and Stage 5 is at 10 days immersion. A significant difference between 45S5 **bioactive glass** results and our own glass fibers is in the time differential. By 8 hours immersion, 45S5 **bioactive glass** had completed Stage 4 and was beginning Stage 5, which plateaus out to eleven days. In the **bioactive glass** fibers, Stage 5 or the formation of crystalline calcium phosphate did not occur at 3 days but was present at 10 days. Therefore, the **bioactive glass** fibers exhibited a reduced rate of surface reactivity, when compared to 45S5 **bioactive glass**.

DETD . . . diffraction (XRD) measurements using the Covina fibers were taken as 2θ varied from 10-150 using an automatic Rigaku diffractometer with **Cu** $K\alpha$. Data collection was performed with a receiving slit of 0.15 mm, a 2 scanspeed of 1/min and a 2. . .

DETD . . . pp. 7-23, CRC Press, Boca Raton (1990); Kokubo et al., High Tech Ceramics, P. Vincenzini, ed., pp. 175-184, Elsevier, B. **V**., Amsterdam (1987); Kokubo et al., Materials in Medicine, 3:79-83 (1992); and Kokubo et al., Proceedings of XV International Congress of Glass, Vol. 3a, O. **V**. Mazurin, ed., pp. 114-119, Leningrad (1988)) primarily due to the increased network forming of the oxide. It has been hypothesized. . .

DETD EXAMPLE **V**

DETD . . . retrieved sections of implant and bone were evaluated mechanically to quantify the interfacial bond strength; histologically, to observe the bone **tissue**/biomaterial interactions; and histomorphometrically, to quantify the amount of bone **tissue** present at the implant surface.

DETD . . . defect into which the plug was press-fit. Closure was in two stages: continuous sutures closure of the periosteum and soft **tissue** and continuous subcutaneous closure of the skin. The wounds were dressed and antibiotics were administered three days post-operatively. Radiographs were. . .

DETD Interfacial bond strength values are shown in FIG. 8. The mean shear strength between the **bioactive glass** fiber/polymer composite and bone **tissue** after six weeks was 12.4 MPa (1798 psi), compared to the control polymer which had a mean value of 5.2. . .

DETD . . . with $CaCO_3$ (50 g/L) and two parts 80% ethanol for a minimum of 24 hours. Following fixation, the blocks of **tissue** were consecutively dehydrated for 24 hours in each 70%, 80%, 90%, and 94% ethanol and for 48 hours in absolute. . .

DETD The composite material showed very close apposition to bone **tissue** at both three and six weeks. As seen in FIG. 9, by six weeks the bone **tissue** was well-integrated with the composite material. The bone was directly opposed to both fibers and polymer. The same observation was detected in FIG. 10 where the bone **tissue** was beginning to interact with the composite fibers after only three weeks. There were no distinct differences between the three. . .

DETD The interface between the polymer and bone was sometimes interposed by fibrous **tissue**, but often had spots of apparent bone contact. There was no interdigitation between the bone apposed to the polymer as. . .

DETD Scanning electron microscopy revealed bone **tissue** in direct apposition to **bioactive glass** fibers after six weeks of implantation. Morphologically, it appears as if a fiber in FIG. 11 is being incorporated into. . .

DETD The interface measured between the polymer region of composite material which was implanted for three weeks and bone **tissue** was approximately 3-4 μm thick. Calcium, phosphorous, sulfur, and silicon were detected in this layer by EDXA. Silicon was not. . .

DETD The areas where glass fibers were exposed to bone **tissue** revealed bone **tissue** adjacent to the glass fibers without an interposing fibrous **tissue** layer. A calcium-phosphate-rich reaction layer was detected on the surface of glass fibers which were in contact with bone **tissue**. However, a distinct region of a silica-rich layer was not detected through SEM/EDXA analysis. This may be due to the. . . layer may have been no thicker than the spatial resolution of the EDXA technique (approximately 2 μm). Previous studies of **bioactive glass** composite show silica-gel thickness layers to be one to two orders of magnitude greater than this (Van Hove et al.,. . . been hypothesized that a reduction in the thickness of the weak silica-gel layer will lead to increased bond strength between **bioactive glass** and bone (Van Hove et al., 1993, supra).

CLM What is claimed is:

1. A **bioactive glass** fiber comprising 40-60% SiO_2, 10-21% CaO, up to about 6.3% P_2O_5, at least 19% Na_2O, and greater than. . .

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COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	97.23	187.11

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